

**GENERAL PLUMBING NOTES** 

CONTRACTOR SHALL PROVIDE APPROVED ACCESS DOORS IN FRAMED HOLES FOR ALL VALVES AND TRAP PRIMERS WHICH MUST BE LOCATED IN INACCESSIBLE

WATER LINES SHALL PASS INSPECTION OF FOUR (4) HOURS UNDER 150 PSI PRESSURE. BEFORE ANY USE OF SYSTEM IS MADE FOR DOMESTIC PURPOSES, IT

SHALL BE DISINFECTED BY SLOWLY FILLING WITH WATER TO WHICH A DISINFECTING AGENT HAS BEEN INJECTED AT A RATE OF 50 P.P.M. OF CHLORINE, WHICH

SHOULD BE ALLOWED TO STAND IN THE PIPING FOR AT LEAST 24 HOURS, AFTER WHICH TESTS FOR RESIDUAL CHLORINE SHALL SHOW NOT LESS THAN FIVE (5)

UNTIL THE REQUIRED RESIDUAL IS OBTAINED AT EVERY OUTLET. AFTER REQUIRED RESIDUAL IS OBTAINED AT EVERY OUTLET, THE SYSTEM SHALL BE FLUSHED

P.P.M. OF RESIDUAL CHLORINE AT EVERY WATER OUTLET IN THE BUILDING. IF THE RESIDUAL IS LESS THAN FIVE PPM, THE DISINFECTION SHALL BE REPEATED

. INSTALL WATER PRESSURE REGULATOR WHERE AVAILABLE UTILITY PRESSURE EXCEEDS 70 PSI. SET PRESSURE REGULATOR AT 65 PSI.

B. DRAIN, WASTE AND VENT LINES SHALL PASS INSPECTION UNDER HEAD OF WATER BY SYSTEM WITH WATER TO TOP OF HIGHEST VENT STACK.

CIVIL ENGINEERING DESIGN COORDINATION NOTICE

REV. REV. REV. REV. REV.

DATE NO. DATE

3. COORDINATION WITH THE CIVIL ENGINEERING DOCUMENTS HAS BEEN COMPLETED ONLY AS SHOWN BELOW.

SALES AREA

102

REFER TO PLUMBING PLAN, THIS SHEET, FOR CONTINUATION

CONTRACTORS RELYING ON DOCUMENTS NOT COORDINATED WITH THE CIVIL ENGINEERING WORK SHALL DO SO AT THEIR OWN RISK.

NO.

REFER TO CIVIL PLANS, \( \Gamma \)

ECO-1

3"SAN -

LAV-1

105

ENLARGED TOILET PLAN

WCO-1

104

FOR CONTINUATION

WATER METER

PRESSURE REGULATOR

(PRESSURE ≥ 65 PSI). —

BACKFLOW PREVENTER -SHUT-OFF VALVE (TYP.)

3/4"CW

P1 / 3/8" = 1'-0"

PROVIDE ALL BACKING, SUPPORTS AND CARRIERS FOR FIXTURES.

ALL WATER PIPING SHALL BE PITCHED IN DIRECTION OF FLOW TO ALLOW FOR SYSTEM DRAINING.

PROVIDE BACKFLOW PREVENTER ASSEMBLY WITH TAMPER RESISTANT ACCESS CABINET PER LOCAL CODE.

UNTIL THE CHLORINE LEVEL AT EVERY OUTLET IS REDUCED TO THAT OF INCOMING WATER SUPPLY.

4. INSTALL WATER MAIN SHUT-OFF VALVE UPSTREAM FROM PRESSURE REGULATOR.

10. SEPTIC SYSTEM NOT ALLOWED WITHOUT WRITTEN APPROVAL BY DOLLAR GENERAL.

12. LIFT STATIONS ARE NOT ALLOWED WITHOUT WRITTEN APPROVAL BY DOLLAR GENERAL.

13. CONTRACTOR RESPONSIBLE FOR ALL PUBLIC UTILITY CONNECTIONS.

NOTICE TO ALL PARTIES HAVING AN INTEREST IN THIS CONSTRUCTION PROJECT:

REFER TO CIVIL PLANS

FOR CONTINUATION

SHUT-OFF VALVE (TYP.)

1. CIVIL ENGINEERING FOR THIS PROJECT IS BEING PERFORMED BY OTHERS.

14. ALL PLUMBING MATERIALS SHALL COMPLY WITH CODE.

CIVIL SHEET

COORDINATION CHECKED BY:

DWG. TITLE

11. HOLDING TANK SYSTEMS NOT ALLOWED.

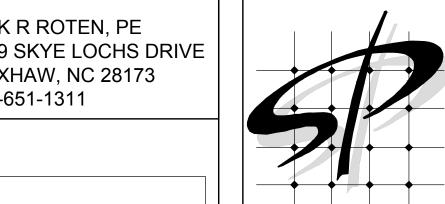
15. REFER TO SHEET P2 FOR MATERIALS.

CIVIL ENGINEERING CONSULTANT:

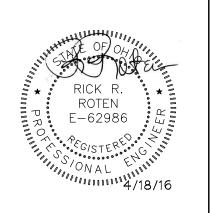
CIVIL SHEET

DWG. NO.

. ROUTE WATER PIPING IN SALES AREA, OVERHEAD AS HIGH AS POSSIBLE.



STORE PLANNING Inc 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997



#	DATE	REVISION

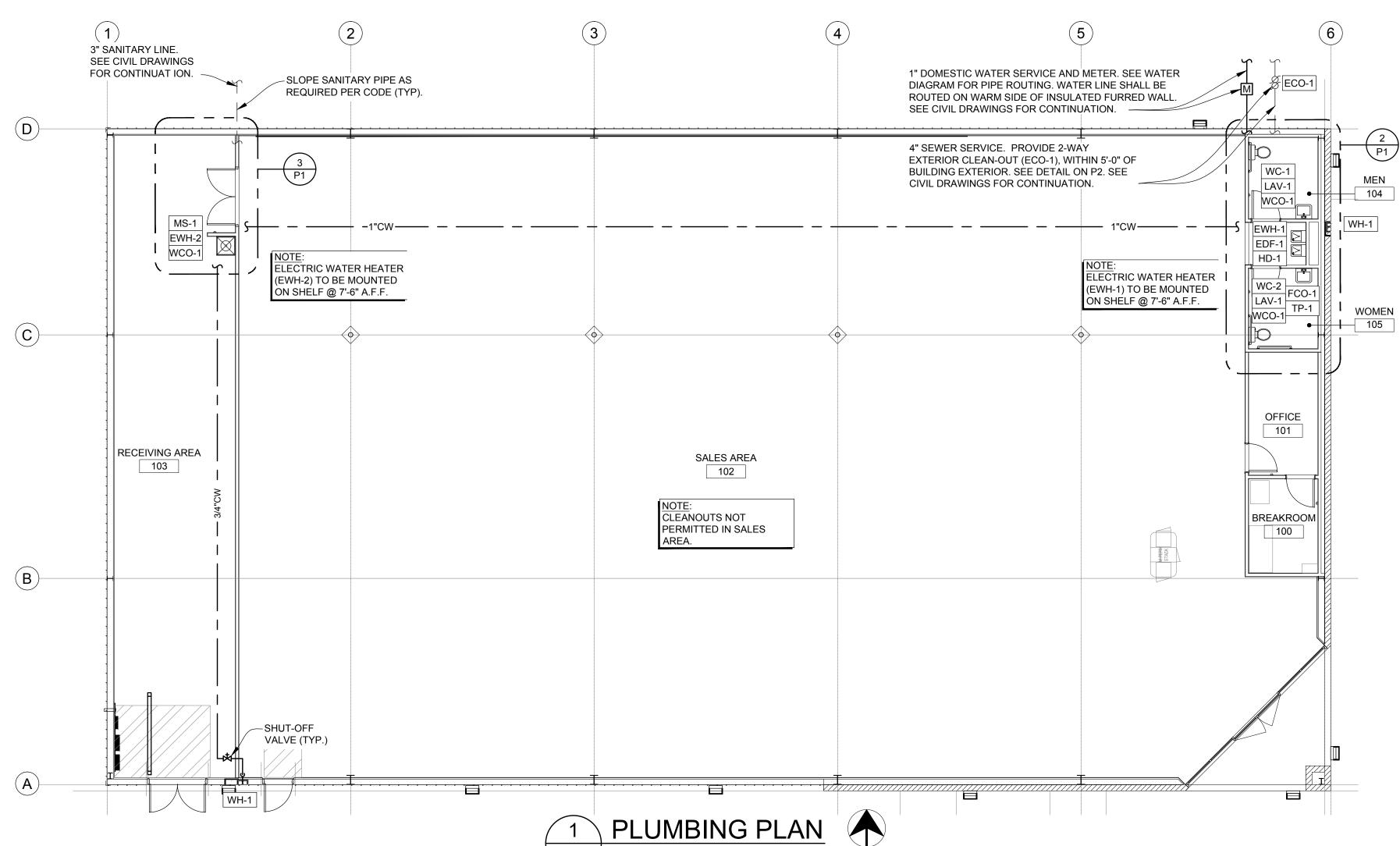
499 SHV

SCHEDUL **PLANS** 

PLUMBING

DATE SPI Client 04-18-16 16137

SHEET NUMBER

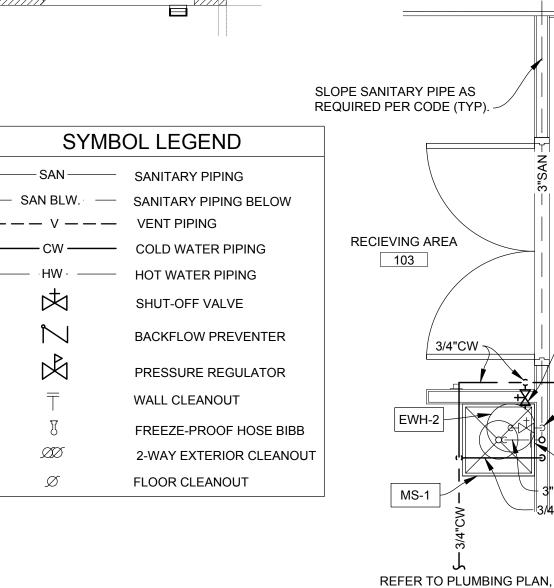


MARK	DESCRIPTION	HW CONNECTION	CW CONNECTION	WASTE CONNECTION	VENT CONNECTION	REMARKS
LAV-1	ADA LAVATORY	1/2"	1/2"	2"	1-1/2"	20"X18" WALL HUNG ADA LAVATORY W/ FRONT OVERFLOW, CONCEALED HANGERS & 4" CENTERS. AMERICAN STANDARD LUCERNE #0355.012 OR EQUAL. FAUCET SHALL BE POLISHED CHROME-PLATED CAST BRASS BODY WITH 4" SPOUT, 4" BRASS WRIST BLADE, 0.5 GPM SPRAY AND POP-UP DRAIN. AMERICAN STANDARD MONTERREY #5501.170 WITH #V05 AERATOR OR EQUAL. INSULATE EXPOSED DRAIN & WATER PIPES WITH TRUEBRO LAV GUARD KIT #102 E-Z. PROVIDE SUPPLIES, STOP VALVES AND P-TRAP.
WC-1	ADA WATER CLOSET	-	1/2"	4"	2"	FLOOR MOUNTED ADA VITREOUS CHINA ELONGATED 1.6 FLUSH GALLON CLOSE COUPLED TWO PIECE SIPHON JET WATER CLOSET, FLUSH TANK WITH 12" ROUGH-IN. AMERICAN STANDARD CHAMPION 4 "RIGHT HEIGHT" #2002.014 OR EQUAL. PROVIDE STOP VALVE, FLEXIBLE SUPPLY LINE, OPEN FRONT SEAT (AMERICAN STANDARD #5901.100 OR EQUAL).
WC-2	ADA WATER CLOSET RIGHT- HAND TRIP LEVER	-	1/2"	4"	2"	FLOOR MOUNTED ADA VITREOUS CHINA ELONGATED 1.6 FLUSH GALLON CLOSE COUPLED TWO PIECE SIPHON JET WATER CLOSET, FLUSH TANK WITH 12" ROUGH-IN. AMERICAN STANDARD CHAMPION 4 "RIGHT HEIGHT" #2002.014 OR EQUAL WITH ALTERNATE TANK ASSEMBLY #4266.804 (RIGHT HAND TRIP LEVER). PROVIDE STOP VALVE, FLEXIBLE SUPPLY LINE, OPEN FRONT SEAT (AMERICAN STANDARD #5901.100 OR EQUAL).
EWH-1, 2	ELECTRIC WATER HEATER	PROVIDE 10 GALLON ELECTRIC WATER HEATER, 1.65KW @ 120V WITH MANUFACTURER SUPPLIE AND PRESSURE RELIEF VALVE. (A.O. SMITH #EJC-10, OR EQUAL). SET WATER HEATER TEMPERATURE AT 110°F MAXIMUM. PROVIDE THERMAL EXPANSION TANK. (AMTROL THERM-X-TROL ST-12, OR EQUAL).  EXPANSION TANK SUPPORT: IT IS THE CONTRACTOR'S RESPONSIBILITY TO PROVIDE ADEQUATE SUPPORT FOR THE EXPANSION.				
MS-1	MOP SINK	3/4"	3/4"	3"	2"	24" X 24" MOLDED STONE MOP SERVICE BASIN, WITH 3' DRAIN. FIAT #MSB-2424 OR EQUAL. PROVIDE SERVICE FAUCET WITH PAIL HOOK & INTEGRAL VACUUM BREAKER, MOP BRACKET, FLAT STAINLESS STEEL STRAINER AND HOSE & BRACKET. FIAT #830 AA, 889 CC, 1453 BB & 832 AA OR EQUAL. PROVIDE SUPPLIES AND P-TRAP.
EDF-1	BARRIER FREE ELECTRIC DRINKING FOUNTAIN	1/2"	-	2"	1-1/2"	TWO-STATION, WALL MOUNTED, ELECTRIC DRINKING FOUNTAIN, BARRIER-FREE ACCESS (ADA), FRONT ONLY EASY TOUCH CONTROL, HIGH UNIT ON RIGHT. ELKAY #EZTLRDDC OR EQUAL. PROVIDE SUPPLY, STOP VALVE & P-TRAP. PROVIDE CANE APRON AS REQUIRED.
WH-1	WALL HYDRANT	3/4"	-	-	-	FREEZE-PROOF WALL HYDRANT WITH BRONZE BODY & ANTI-SIPHON VACUUM BREAKER, BOX AND LOCKING COVER PROVIDE WITH HOSE CONNECTION AND MOUNT AT 24" ABOVE GRADE. WOODFORD #B65 OR EQUAL.
WCO-1	WALL CLEAN-OUT	-	-	AS SHOWN ON PLANS	-	SIZE & INSTALL AS SHOWN ON PLANS. JOSAM, ZURN OR EQUAL.
HD-1	HUB DRAIN	1/2"	-	3"	2"	PROVIDE 3" PIPE SIZE WITH FUNNEL AND 1/2"Ø TRAP PRIMER CONNECTION. JOSAM, ZURN OR EQUAL.
TP-1	TRAP PRIMER	-	1/2"	-	-	PROVIDE PRESSURE DROP ACTIVATED BRASS TRAP SEAL PRIMER, WITH REMOVABLE FILTER SCREEN. MIFAB #M2-500. NO SUBSTITUTIONS. PROVIDE AIR GAP FITTING. MIFAB #MIGAP. NO SUBSTITUTIONS. PROVIDE DISTRIBUTION UNIT, WHERE TRAP PRIMER SERVES MULTIPLE FLOOR DRAINS, MIFAB #MI-DU-500. NO SUBSTITUTIONS.
ECO-1	EXTERIOR CLEAN-OUT	-	-	4"	-	PROVIDE TRAFFIC RATED, 2-WAY, EXTERIOR CLEANOUT. TYLER PIPE #003519, OR EQUAL.
FCO-1	FLOOR CLEAN-OUT	-	-	AS SHOWN ON	_	PROVIDE ADJUSTABLE FLOOR CLEANOUT WITH WATERTIGHT TAPERED THREADED PLUG AND ROUND SCORIATED

SECURED TOP, ADJUSTABLE TO FINISHED FLOOR. SIZE & INSTALL AS SHOWN ON PLANS. JOSAM, ZURN OR EQUAL.

**PLANS** 

FLOOR CLEAN-OUT



- — — V — — VENT PIPING COLD WATER PIPING

> ENLARGED STOCKROOM PLAN P1 / 3/8" = 1'-0"

THIS SHEET, FOR CONTINUATION

REQUIRED INVERT AT POINT OF CONNECTION (5 FT FROM EXTERIOR WALL) TO EXISTING SEWER SERVICE IS APPROXIMATELY 2'-0" BELOW FINISHED FLOOR BASED ON TOTAL LENGTH OF X' SLOPED AT 1/8" PER FT AND STARTING INVERT OF 18" BELOW FINISHED FLOOR. CONTRACTOR TO FIELD VERIFY THE INVERT AND LOCATION OF SANITARY LINE AS SHOWN ON CIVIL DRAWINGS.

REFER TO SHEET P2, FOR ROUTING OF DOMESTIC WATER, SANITARY SEWER AND SANITARY VENT PIPING.

PROVIDE TAMPER PROOF CABINET WITH ACCESS PANEL FOR BACKFLOW ASSEMBLY DOMESTIC WATER, SANITARY SEWER AND SANITARY VENT PIPE ROUTING ARE DIAGRAMMATIC ONLY, COORDINATE PIPE ROUTING WITH FIELD CONDITIONS. REFER TO PIPING DIAGRAMS ON SHEET P2.

-CLEAN-OUT PLUG AS SPECIFIED.

FLOOR SLAB ON GRADE

LONG SWEEP ELBOW AT

END, OR TURN OF RUN.

COMBINATION WYE AND EIGHTH

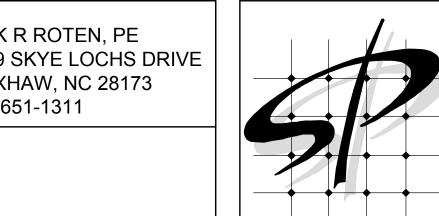
BEND IN RUN. REDUCING TYPE IF

REQUIRED. ENTER TOP OF PIPE.

MEMBRANE CLAMP

APPLY TEFLON JOINT COMPOUND

TO THE CLEAN-OUT PLUG THREADS.



STORE PLANNING Inc. 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997



# DATE REVISION

2. PROVIDE FLOOR CLEAN-OUT WITH ADJUSTABLE COVER. CLEAN-OUT COVER SHALL BE SUITABLE FOR RESPECTIVE FLOOR COVERING (RECESSED FOR TILE, SCORIATED FOR UNFINISHED FLOORS, ETC.). CLEAN THE TOP OF EXPOSED FLOOR CLEAN-OUT AFTER

FLOOR CLEANOUT DETAIL

1. REFER TO SCHEDULE FOR ADDITIONAL INFORMATION. LOCATE FLOOR CLEAN-OUT AT

AND/OR WHERE SHOWN ON PLANS & RISERS. PROVIDE BACKFILL AS REQUIRED.

COORDINATE WITH LOCAL CODES AND AUTHORITY HAVING JURISDICTION FOR ANY

LOCATE CLEAN-OUT WHERE THERE IS 18" CLEAR AROUND, FOR ACCESSIBILITY.

END OF RUN, TURNS OF PIPE GREATER THAN 45°, 50' INTERVALS ON STRAIGHT RUNS,

INSTALLATION WHEN TAPPED FROM HORIZONTAL PIPE RUN. — SUPPLY MAIN COLD WATER BALL VALVE — SUPPLY MAIN DISTRIBUTION UNIT SHALL BE USED WHERE TRAP PRIMER VALVE SERVES MULTIPLE FLOOR DRAINS (UP TO 3 FLOOR DRAINS MAXIMUM). INSTALLATION WHEN TAPPED ALL PIPING SHALL BE SECURELY FROM VERTICAL PIPE RUN. 1/2" CW -ATTACHED TO WALL. TRAP PRIMER VALVE, - 24" X 24" ACCESS LOCATED WITHIN WALL PANEL AND FRAME MIFAB #M2-500, OR EQUAL. AIR GAP FITTING MIFAB #MIGAP, OR EQUAL. -TRAP PRIMER VALVE SHALL BE MOUNTED 1'-0" A.F.F. FOR DISTRIBUTION UNIT, EVERY 20'-0" OF (WHERE REQUIRED). PRIMER LINE. MIFAB #MI-DU, OR EQUAL — MINIMUM 1'-0" WHEN REQUIRED, SECURE 1/2" COPPER TUBING TRAP SUPPLIES DISTRIBUTION (COORDINATE WITH ACTUAL NUMBER OF

SHEET BETWEEN FLOOR TO FLOOR DRAIN TRAPS. NO FITTINGS STUDS. BELOW SLAB. SEE PLAN, SHEET P1). -TYPICAL TRAP PRIMER DETAIL

FLOOR DRAIN/HUB DRAIN). ROUTE BELOW

UNIT TO BACKING

HOSE & HOSE BRACKET

- DIELECTRIC

OUTLET HEAT TRAP

HEIGHT OF 7'-6" A.F.F.

HEATER SHELF.

SERVICE FAUCET

- MOP SINK (MS-1)

- (EWH-2) INSTALL WATER HEATER ABOVE MOP SINK

(MS-1). PLATFORM SHALL BE INSTALLED AT A

NOTE: ELECTRIC WATER HEATER (EWH-1) SHALL

DRINKING FOUNTAIN (EDF-1) JUST ABOVE CEILING.

SIMILARLY BE INSTALLED ABOVE ELECTRIC

REFERENCE ARCH. DETAIL FOR WATER

- 4" DEEP GALVANIZED DRAIN PAN.

FULL SIZE DRAIN LINE, ROUTE AND

- MOP BRACKET. INSTALL SO MOP

ALWAYS DRIP INTO MOP SINK (MS-1)

TERMINATE 2" ABOVE MOP SINK (MS-1).

NOTE: ELECTRIC WATER HEATER (EWH-1)

SHALL BE ROUTED TO HUB DRAIN (HD-1).

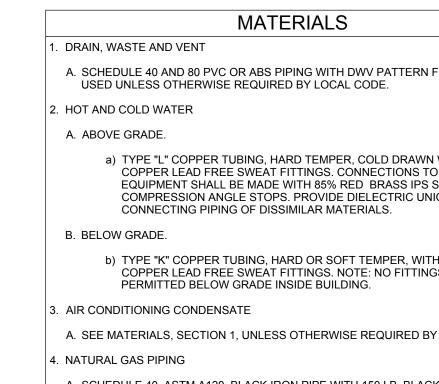
WATER HEATER DETAIL

4" VENT

THRU WALL 🗽

ECO-1

BREAKER



SHUT-OFF

3/4" C.W. INLET -

3/4" H.W. OUTLET -

T & P RELIEF VALVE -

INLET HEAT TRAP-

DIELECTRIC

WATER HEATER DRAIN—

THERMAL EXPANSION

TANK. SIZE AND INSTALL

PER MANUFACTURER'S

DISCHARGE LINE, FROM DRAIN PAN TO

DISCHARGE LINE, FULL SIZE OF T&P

VALVE, TO MOP SINK (MS-1).

NOTE: ELECTRIC WATER HEATER (EWH-1)

SHALL BE ROUTED TO HUB DRAIN (HD-1). —

NOTE: ELECTRIC WATER HEATER (EWH-1)

SHALL BE ROUTED TO HUB DRAIN (HD-1).

MOP SINK (MS-1).

RECOMMENDATIONS. DO NOT

SUPPORT WITH PIPING ALONE.-

VALVE (TYP.)-

A. SCHEDULE 40 AND 80 PVC OR ABS PIPING WITH DWV PATTERN FITTINGS TO BE a) TYPE "L" COPPER TUBING, HARD TEMPER, COLD DRAWN WITH WROUGHT COPPER LEAD FREE SWEAT FITTINGS. CONNECTIONS TO FIXTURES AND EQUIPMENT SHALL BE MADE WITH 85% RED BRASS IPS SIZE PIPE OR COMPRESSION ANGLE STOPS. PROVIDE DIELECTRIC UNIONS WHERE b) TYPE "K" COPPER TUBING, HARD OR SOFT TEMPER, WITH WROUGHT COPPER LEAD FREE SWEAT FITTINGS. NOTE: NO FITTINGS SHALL BE A. SEE MATERIALS, SECTION 1, UNLESS OTHERWISE REQUIRED BY CODE. A. SCHEDULE 40, ASTM A120, BLACK IRON PIPE WITH 150 LB. BLACK MALLEABLE THREADED OR SOCKET WELDED FITTINGS.

> 4" SEWER SERVICE. PROVIDE 2 WAY EXTERIOR CLEAN-OUT (ECO-1), WITHIN 5'-0" OF BUILDING

3" SANITARY LINE. SEE CIVIL

DRAWINGS FOR CONTINUATION.

EXTERIOR. SEE CIVIL DRAWINGS FOR CONTINUATION.-

SLOPE SANITARY PIPE AS REQUIRED PER CODE (TYP).

> 2" VENT THRU WALL

# 2-WAY YARD CLEANOUT DETAIL

2. ECO-1 SHALL BE INSTALLED WITHIN 5'-0" OF THE BUILDING EXTERIOR.

CLEAN-OUT SHALL BE TRAFFIC RATED.

الحصاً ا

TYPICAL WATER HEATER STRAPPING DETAIL

METAL CUP WITH (3) SHEET

METAL SCREWS FASTENED

WATER HEATER -

TO BOTH STUDS -

SHELF MOUNTED WATER HEATER STRAP TO

1/3 & (1) ON THE LOWER 1/3 MAINTAINING A

WATER HEATER DRAIN -

4" DEEP GALVANIZED

MINIMUM OF 4" FROM CONTROLS. -

DRAIN PAN

INSTALL WATER HEATER (EWH-2) ABOVE MOP SINK

NO**T**E: ELECTRIC WATER HEATER (EWH-1) SHALL

FOUNTAIN (EDF-1) JUST ABOVE CEILING.

SIM LARLY BE INSTALLED ABOVE ELECTRIC DRINKING

BRONZE TAPER THREAD PLUG

**FLUSH WITH** 

GRADE LINE. -

WITH COUNTER SUNK HEAD. -

(MS-1) AT A HEIGHT OF 7'-6" A.F.F.

WALL AS INDICATED. (1) STRAP ON THE UPPER

- (2) SHEET METAL

SCREWS

WATER HEATER

LATERAL SUPPORT

3/4" WIDE 20

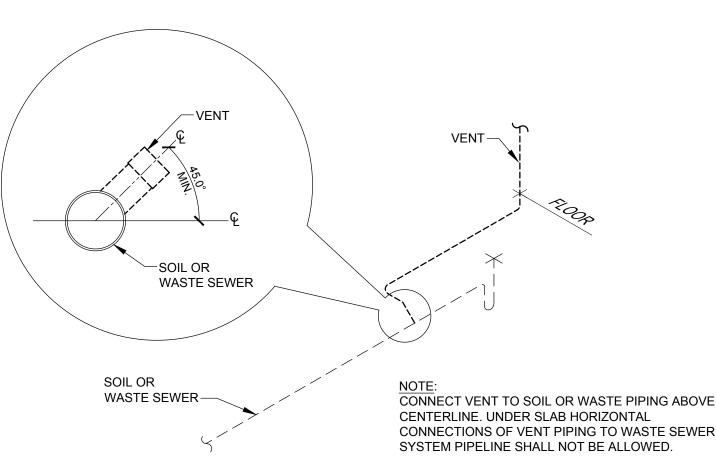
**GAUGE STRAP** 

EXTRA HEAVY DUTY CAST IRON

ADJUSTABLE SCORIATED

SECURED COVER.

-WASTE LINE LENGTH TO SUIT.



VENT PIPE INSTALLATION DETAIL



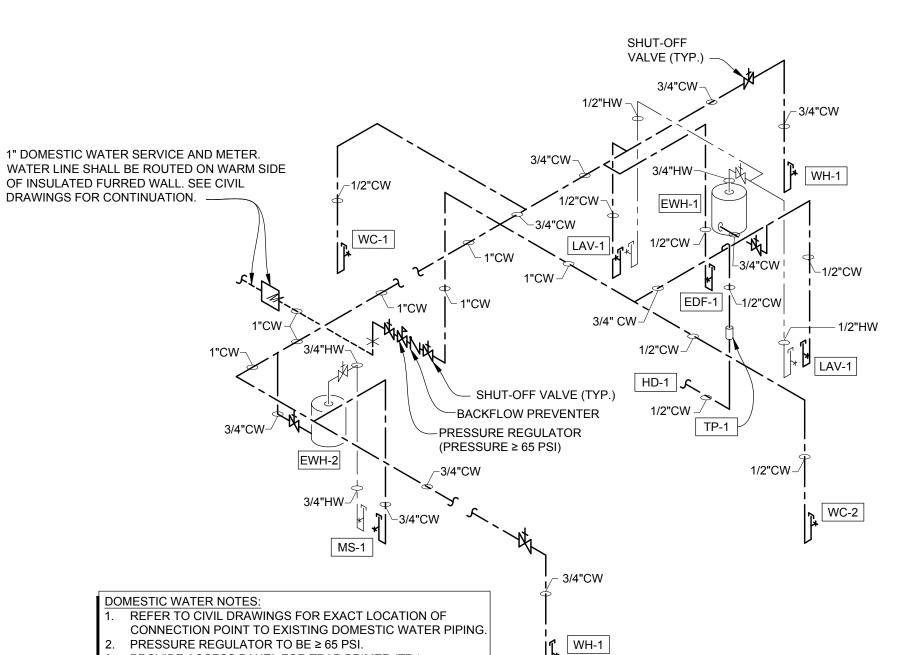
EWH-1 TO DRAIN INTO HUB DRAIN (HD-1).

EWH-2 TO DRAIN INTO MOP SINK (MS-1).

SANITARY SEWER NOTES:

1-1/2"V -

LAV-1



PROVIDE ACCESS PANEL FOR TRAP PRIMER (TP-

SAME SIZE

AS REQUIRED FOR

DEPTH OF SEWER.-

SANITARY SEWER,

ADDITIONAL REQUIREMENTS.

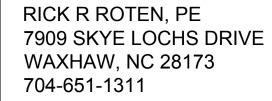
SIZE PER PLAN.

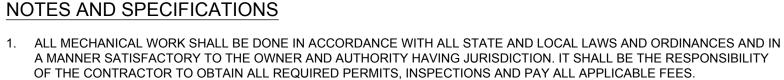
AS DRAIN LINE -

DOMESTIC WATER ISOMETRIC

DIAGRAMS

SPI Client DATE 04-18-16 SHEET NUMBER





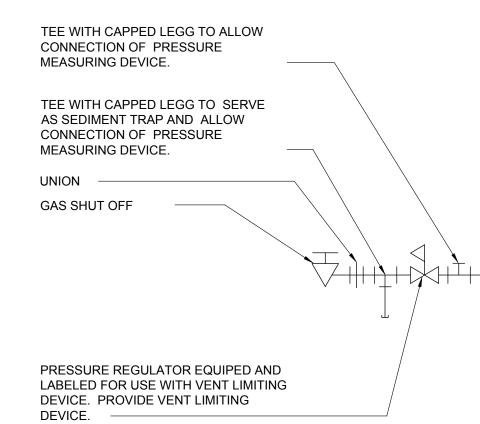
ACCORDANCE WITH MANUFACTURERS WRITTEN INSTALLATION GUIDE. PROVIDE CONCENTRIC DIFFUSER KIT AS SPECIFIED BY DOLLAR GENERAL NATIONAL ACCOUNTS HVAC

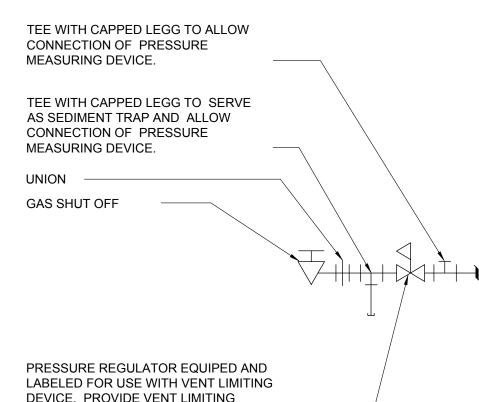
2. CARRIER OR YORK PACKAGED HVAC SYSTEMS ARE REQUIRED. ALL HVAC EQUIPMENT SHALL BE INSTALLED IN STRICT

MANUFACTURERS. (NO EXCEPTIONS PERMITTED). CONCENTRIC DIFFUSER KIT SHALL BE INSTALLED IN STRICT ACCORDANCE WITH MANUFACTURERS INSTALLATION INSTRUCTIONS. CONCENTRIC DIFFUSER SHALL BE HARD DUCTED FROM HVAC UNIT, THE USE OF FLEXIABLE DUCT DROPS ARE NOT ALLOWED, NO EXCEPTIONS.

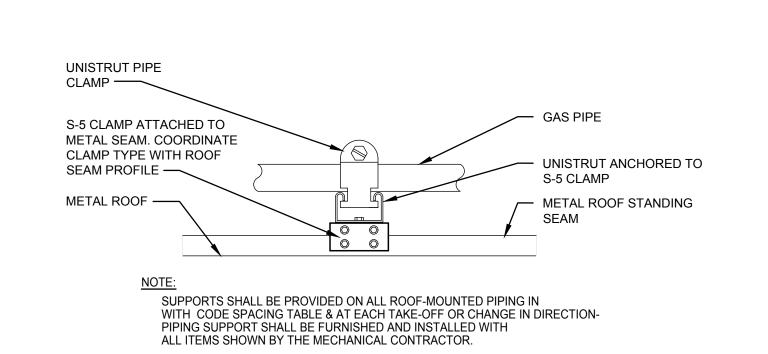
4. REFER TO SHEET S3, FOR GENERAL NOTES AND DETAILS FOR ROOF CURB INFORMATION.

- 5. ALL SUPPLY AND EXHAUST AIR DUCTWORK SHALL BE CONSTRUCTED OF ROUND GALVANIZED SHEET METAL AND BE FABRICATED ACCORDING TO THE LATEST EDITION OF THE SMACNA HVAC DUCT CONSTRUCTION STANDARDS FOR METAL AND FLEXIBLE DUCTWORK. SUPPLY, RETURN AND POSITIVE PRESSURE EXHAUST DUCTWORK SHALL BE SEALED IN ACCORDANCE WITH SMACNA SEAL CLASS C.
- 6. TESTING OF HVAC UNITS THRU EMS PANEL IS ACCOMPLISHED BY WARMING UP OR COOLING DOWN A SPACE TEMPERATURE SENSOR AND WATCH THE FAN, HEAT AND COOL STAGES CYCLE ON AND OFF. THIS REQUIRES TWO PEOPLE AT ALL TIMES...ONE TO WATCH THE SCREEN AND THE OTHER TO WATCH OPERATION OF THE HVAC UNIT. WHEN COMPLETE, PRESS THE HOME BUTTON TO RETURN TO THE MAIN SCREEN.
- 7. COORDINATE HVAC SENSORS LOCATIONS WITH SHEET EMS1. LOCATE SPACE TEMPERATURE SENSORS AT 8'-0" A.F.F.
- 8. PROVIDE CEILING MOUNTED EXHAUST FAN FOR RESTROOMS, INTERLOCK WITH RESTROOM LIGHTS. EXHAUST FAN SHALL BE VENTED THRU SIDE WALL, NOT THRU THE ROOF.





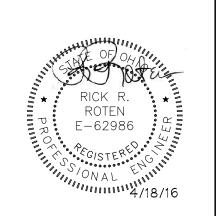




ROOF MOUNTED PIPE SUPPORT (S-5)



STORE PLANNING Inc 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997



# DATE REVISION

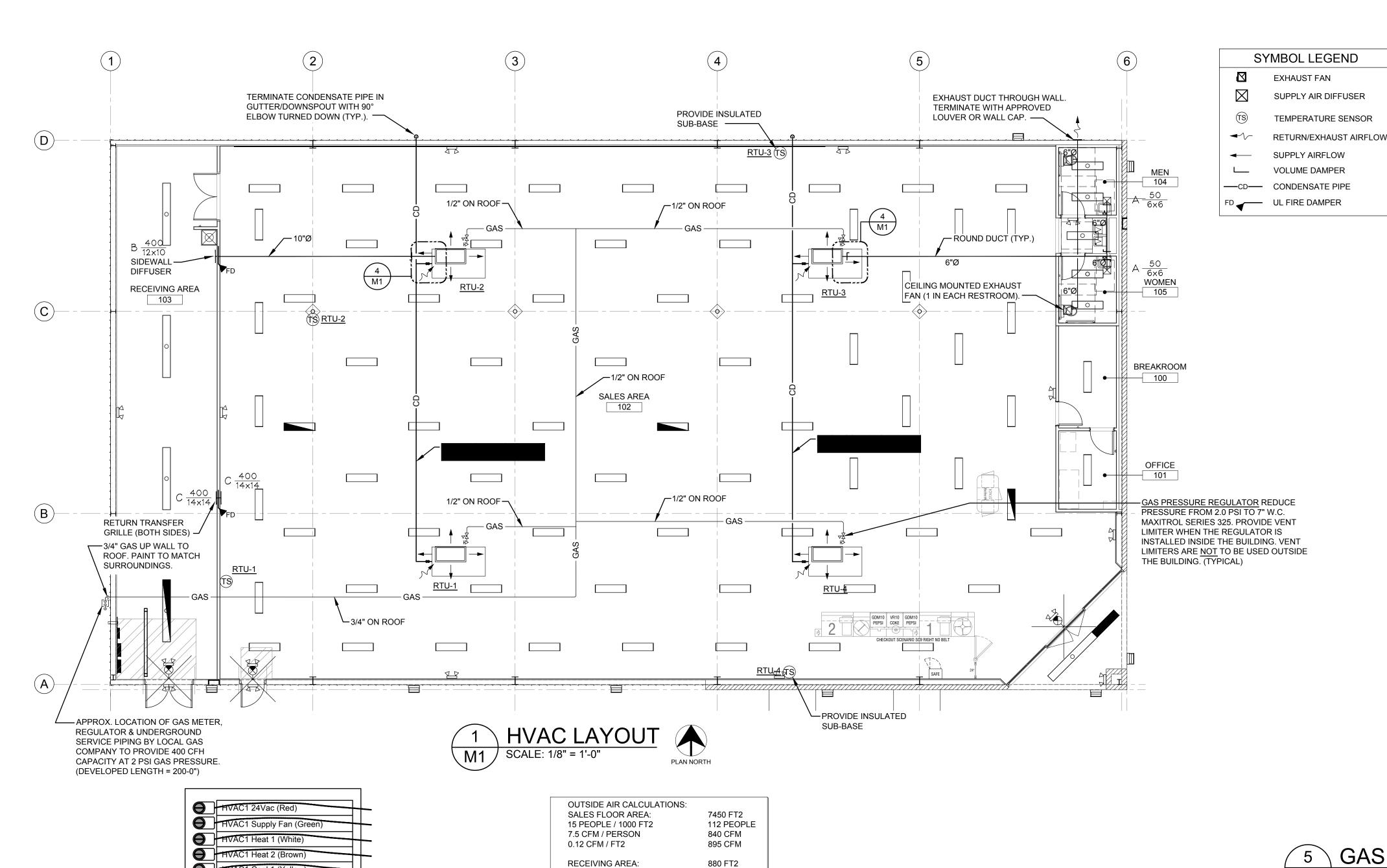
0 P

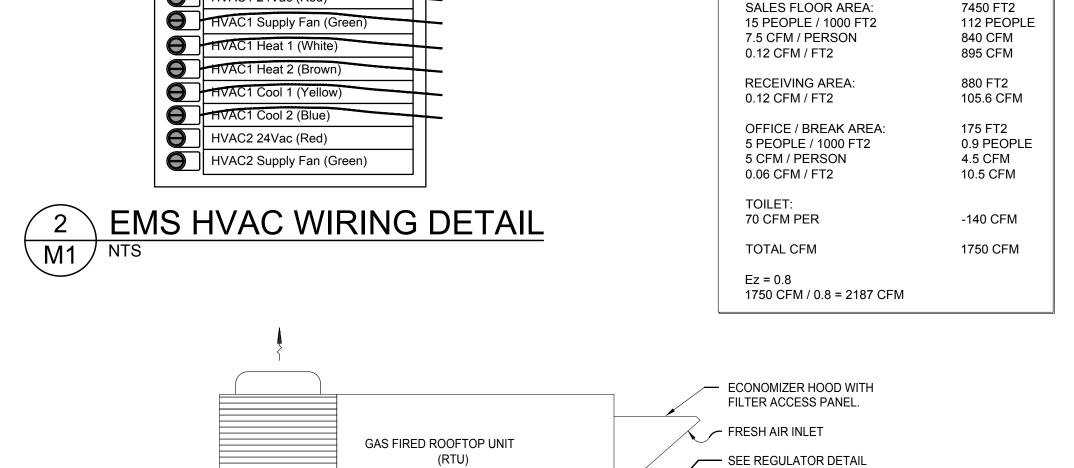
SPI Client DATE

MECHANICAL

04-18-16 SHEET NUMBER

M1





1" CONDENSATE

GAS COCK

TO SPLASH BLOCK

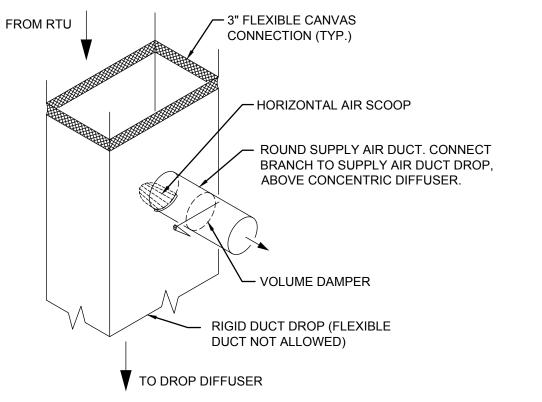
GAS PIPING ON ROOF

- DRIP LEG BY M.C ROOFTOP UNIT DETAIL

MANUFACUTURED

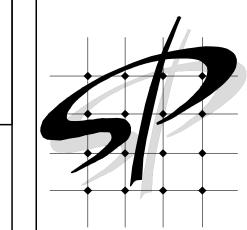
ROOF CURB.

ROOFING

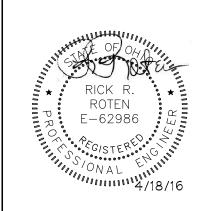


INSTALL HORIZONTAL AIR SCOOP HAVING A CONTINUOUSLY CURVED CROSS SECTION AND BALANCING DAMPER AT DUCT CONNECTION TO DIVERT SUPPLY AIR INTO THE CONNECTED DUCTWORK. LENGTH OF SCOOP SHALL BE LIMITED TO THE WIDTH OF THE SUPPLY AIR ANNULAR SPACE.

TYPICAL SUPPLY BRANCH **CONNECTION DETAIL** M1 / NTS



STORE PLANNING Inc 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997



	#	DATE	REVISION

# AL #17434 REET O 43103

# OLLAR GENERAL #174 499 LONG STREET ASHVILLE, OHIO 43103

# SCHEDULES & NOTES

SPI Client DATE
16137 04-18-16

CHANIC/

SHEET NUMBER

HVAC UNIT SCHEDULE HEATING FAN DATA ELECTRICAL DATA CAPACITY CAPACITY MARK MANF. & MODEL WEIGHT EER NOTES TOTAL SENS. INPUT OUT CFM O.A. E.S.P. HP MBH MBH MBH WBH VOLT/PH MCA FUSE 2400 570 1.0 3.0 68.8 50.4 100 80 208V/3ø 31.3 40 YORK ZF072N08N2AAA 750 LBS. 11.0 | 1,2,3,4,5,6 750 LBS. YORK ZF072N08N2AAA 2400 | 575 | 1.0 | 3.0 | 68.8 | 50.4 100 | 80 | 208V/3ø | 31.3 | 40 | 11.0 1,2,3,4,5,6 HVAC-2 2400 | 575 | 1.0 | 3.0 | 68.8 | 50.4 | 100 | 80 | 208V/3¢ | 31.3 | 40 | 11.0 | 1,2,3,4,5,6 YORK ZF072N08N2AAA 750 LBS. HVAC-3 2400 | 575 | 1.0 | 3.0 | 68.8 | 50.4 | 100 | 80 | 208V/3ø | 31.3 | 40 | 750 LBS. 11.0 | 1,2,3,4,5,6 YORK ZF072N08N2AAA HVAC-4

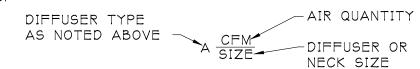
### NOTE

- 1. COOLING CAPACITIES ARE RATED IN ACCORDANCE WITH ARI STANDARD 210/290 AT 95F AMBIENT OUTDOOR AIR TEMP., 80F DRY BULB, 67 WET BULB ENTRANCE AIR TEMP., AND NOMINAL AIR QUANTITY LISTED.
- 2. FACTORY INSTALLED: <u>THRU-THE-BASE CONNECTIONS</u>
- 3. PROVIDE BOTTOM DISCHARGE, BELT DRIVE AND AIR SIDE ECONOMIZER SECTION WITH DUAL ENTHALPY SENSOR AND BAROMETRIC RELIEF DAMPER.
- 4. PROVIDE MANUFACTURES CONCENTRIC KIT.
- 5. MECHANICAL CONTRACTOR SHALL COORDINATE WITH METAL BUILDING MANUFACTURER FOR ROOF CURB
- 6. UNITS SHALL BE YORK PURCHASED THROUGH A NATIONAL ACCOUNT AGREEMENT; YORK -- PHONE# 800-481-9738 -- york-dollargeneral-be@jci.com

	AIR DISTRIBUTION SCHEDULE										
MARK	MANUFACTURER & MODEL #	FRAME TYPE	FACE TYPE	PATTERN	DAMPER	MATERIAL	SERVICE	FINISH	MAX. PD	MAX NC	NOTES
А	PRICE SMD	12×12 A.C.T.	LOUVER	4-WAY	NO	STEEL	SUPPLY	OFF-WHITE	0.15"	<30	1-3
В	PRICE 520	SURFACE	GRILLE	4-WAY	YES	STEEL	SUPPLY	OFF-WHITE	0.15"	<30	1-3
С	PRICE 530	SURFACE	GRILLE	N/A	NO	STEEL	TRANS	OFF-WHITE	O.15 <sup>II</sup>	<30	1,3

# NOTES:

1. DIFFUSER DESIGNATIONS ON PLANS AS FOLLOWS:



- 2. PROVIDE SQUARE TO ROUND TRANSITION MODEL TR.
- 3. ACCEPTABLE MANUFACTURES: CARNES, TUTTLE & BAILEY, PRICE & TITUS. (NO SUBSTITUTIONS)

			E	KHAUST FAN	SCHE	ULE				
MARK	MANUFACTURER & MODEL	СЕМ	S.P.	FAN TYPE	MOUNTING	DRIVE	MAX. SONES	MOTO	DR DATA VOLT/PH	NOTES
EF-1	GREENHECK SP-A110	75	0.25	CABINET	CEILING	DIRECT	0.8	49	120V/1¢	1-3
									·	
EF-2	GREENHECK SP-A110	75	0.25	CABINET	CEILING	DIRECT	0.8	49	120V/1ø	1-3

# NOTES:

- 1. FAN SHALL BE INTERLOCKED WITH LOCAL LIGHT SWITCH.
- 2. PROVIDE WITH BACKDRAFT DAMPER
- 3. PROVIDE FAN MOUNTED SPEED CONTROL.

# MECHANICAL GENERAL NOTES

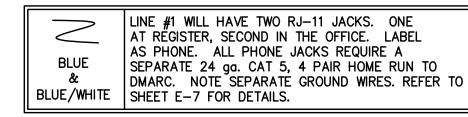
- 1. DO NOT SCALE DRAWINGS. SEE ARCHITECTURAL DRAWINGS AND REFLECTED CEILING PLAN FOR EXACT LOCATION OF DOORS, WINDOWS, CEILING DIFFUSERS, ETC.
- 2. ALL DUCTWORK AND PIPING SHALL BE COORDINATED WITH THE WORK PERFORMED UNDER OTHER DIVISIONS TO AVOID INTERFERENCE.
- 3. NOT USED
- 4. HVAC CONTRACTOR SHALL REPAIR, REPLACE, OR REPAINT TO MATCH EXISTING SURFACES DAMAGED BY THE HVAC CONTRACTOR DURING INSTALLATION OF MECHANICAL EQUIPMENT.
- 5. HVAC CONTRACTOR SHALL REMOVE FROM THE JOBSITE ANY MATERIALS NOT ECONOMICALLY RECOVERABLE. ANY MATERIALS REMOVED FROM THE JOBSITE AND SOLD FOR SALVAGE SHALL BE CREDITED TO THE OWNERS ACCOUNT.
- 6. INSTRUMENT TEST HOLES SHALL BE LOCATED IN ALL NEW SUPPLY, EXHAUST, AND RETURN DUCTS.
- 7. HVAC CONTRACTOR SHALL PROVIDE AND INSTALL MANUAL BALANCING DAMPERS IN DUCTWORK FIVE FEET UPSTREAM OF ALL DUCTED DIFFUSERS. IF FIVE FEET CANNOT BE MAINTAINED THE MAXIMUM DISTANCE POSSIBLE SHOULD BE OBSERVED. THE CONTRACTOR SHALL ALSO PROVIDE AND INSTALL ALL DAMPERS NECESSARY TO BALANCE THE SYSTEM TO AIR FLOW VALUES SHOWN ON PLANS.
- 8. MAXIMUM LENGTH OF FLEXIBLE DUCT SHALL BE SEVEN FEET.
- 9. DUCT SIZES GIVEN ARE INSIDE CLEAR DIMENSIONS.
- 10. HVAC CONTRACTOR SHALL PROVIDE AND INSTALL FIRE AND/OR SMOKE DAMPERS WHERE INDICATED ON PLANS AND IN SUCH LOCATIONS AS REQUIRED BY APPLICABLE CODE. INSTALLATION OF FIRE AND/OR SMOKE DAMPERS SHALL BE IN STRICT ACCORDANCE WITH THE DAMPER MANUFACTURERS RECOMMENDATIONS.
- 11. ALL VALVES AND PIPING SPECIALTIES SHALL BE LINE SIZED UNLESS NOTED OTHERWISE. USE ECCENTRIC REDUCERS ON CONTROL VALVES WHERE REQUIRED.
- 12. DUCTWORK SHALL BE GALVANIZED SHEET METAL CONSTRUCTED IN ACCORDANCE WITH THE LATEST SMACNA STANDARDS.
- 13. DUCTWORK SHALL BE WRAPPED WITH 2" FIBER GLASS INSULATION EQUAL TO MANVILLE "MICROLITE". EXPOSED DUCTWORK SHALL BE INTERNALLY INSULATED..
- 14. FLEXIBLE DUCTWORK SHALL BE EXTERNALLY INSULATED AND CONFORM TO ALL REQUIREMENTS OF U.L. 181 FOR CLASS 1 DUCTS.
- 15. ALL PIPING, DUCTS, VENTS, ETC. EXTENDING THROUGH THE WALL AND/OR ROOF SHALL BE FLASHED AND COUNTERFLASHED IN A WATERPROOF MANNER.
- 16. ALL PIPING INSULATION SHALL RUN CONTINUOUSLY THROUGH FLOOR, WALLS, AND PARTITIONS.
- 17. ALL PIPING SHALL BE SUPPORTED ADJACENT TO EQUIPMENT, TO PREVENT WEIGHT OF PIPING BEING PLACED ON EQUIPMENT.
- 18. HVAC CONTRACTOR SHALL PROVIDE ALL ROOF CURBS TO THE GENERAL CONTRACTOR FOR
- ASSEMBLY AND INSTALLATION PRIOR TO THE INSTALLATION OF ROOFING MATERIALS.

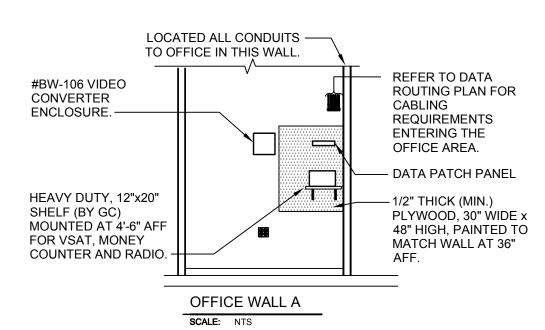
  19. HVAC CONTRACTOR SHALL VERIFY ALL EXISTING CONDITIONS ON JOBSITE.
- 20. VERIFY ALL ROUTING OR ALL WORK ON JOBSITE.
- 21. GENERAL CONTRACTOR SHALL FURNISH AND INSTALL ALL SUPPORTING ANGLES AND EXTRA SUPPORT BEAMS FOR ROOF-TOP A.C. UNITS, EXHAUST FANS, ETC.
- 22. IT IS THE INTENTION OF THESE DRAWINGS TO COVER ALL WORK FOR A COMPLETE FIRST CLASS MECHANICAL INSTALLATION. ANY EQUIPMENT, TRIM HARDWARE AND/OR DEVICES USUALLY UTILIZED IN THE CLASS OF WORK, THOUGH NOT SPECIFICALLY MENTIONED OR SHOWN ON THE DRAWINGS, BUT WHICH MAY BE NECESSARY FOR THE SATISFACTORY COMPLETION OF THE WORK (AS DETERMINED BY THE ARCHITECT) SHALL BE FURNISHED AND INSTALLED BY THE HVAC CONTRACTOR AS PART OF HIS TOTAL WORK.
- 23. HVAC CONTRACTOR SHALL HAVE THE MECHANICAL SYSTEMS BALANCE BY AN INDEPENDENT CERTIFIED BALANCE CONTRACTOR. THIS CONTRACTOR SHALL PREPARE A WRITTEN REPORT FOR SUBMISSION TO THE ENGINEER.

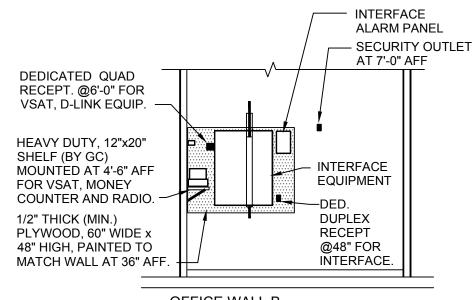
## **ELECTRICAL SPECIFICATIONS:**

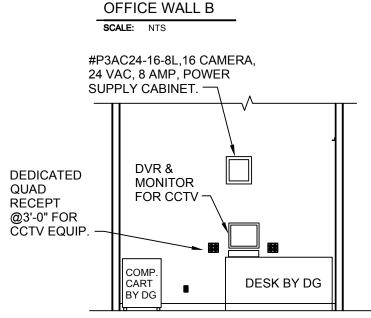
- 1. ALL EXPOSED WIRING SHALL BE CONTAINED IN CONDUIT OF PROPER
- 2. ALL WIRING SHALL CONFORM TO LOCAL, STATE, AND FEDERAL CODES.
- 3. SERVICE IS TO BE MINIMUM 400 AMP, 3 PHASE.
- 4. REQUIRED CUSTOM BUILT POWER POLE ASSEMBLIES AVAILABLE FROM D&P CUSTOM LIGHTS & PRODUCTS INC. PHONE: (800) 251-2200 OR (615) 350-7800, 7111 COCKRILL BEND INDUSTRIAL ROAD, NASHVILLE, TN 37209 SEE E3.A
- 5. EXTERIOR EXPOSED PHONE LINES TO BE INSTALLED IN RIDGED CONDUIT. PROVIDE EMERSON 3/4" X 5-FT. METALLIC CABLE U-GUARD #755, OR EQUAL.
- 6. ELECTRICAL PANEL TO BE LABELED CORRECTLY AND WITH LEGIBLE
- 7. PHONE LINES TWO RJ-11 PORTS. ONE (1) LOCATED IN OFFICE W/RJ-45 DATA JACK COMBO AND ONE (1) AT REGISTER. 24 GA. CAT 5, 4-PAIR TWISTED WIRE ONLY. USE BLUE AND BLUE & WHITE WIRES. HOOK TO LINE #1 TERMINAL IN RJ-11 JACK EACH PHONE JACK TO HAVE DEDICATED, SEPARATE HOME RUN TO DMARC. LABEL AS "PHONE" AT THE DESTINATION AND AT DMARC. PHONE COMPANY PROVIDES FINAL HOOK UP TO DMARC ONLY. PHONE JACKS ARE SUPPLIED AND WIRED BY CONTRACTOR.
- 8. PROVIDE 1 1/2" EMT CONDUIT TO ACT AS ACCESS SLEEVE TO ALLOW PHONE COMPANY TO TERMINATE AT DMARC. CONTRACTOR TO PROVIDE & INSTALL PHONE WIRING & RJ-11 PHONE JACK FOR A COMPLETED WORKING SYSTEM PRIOR TO PHONE COMPANY FINAL HOOK-UP.
- 9. ALL 120 VOLT OUTDOOR RECEPTACLES TO HAVE "WET LOCATION IN USE" COVERS.
- 10. ALL CONDUCTORS TO BE COPPER, #12 AWG MINIMUM SIZE, OR SIZE AS REQUIRED BY LOAD AND OVER CÜRRENT PROTECTION.
- 11. SEE EMS SHEETS EMS1.A, EMS2.A, EMS3.A, EMS4.A FOR ENERGY MANAGEMENT SYMBOLS AND INFORMATION.

12. ELECTRICIAN TO PROVIDE 1½" CONDUIT WITH PULL STRING FOR SATELLITE LINE. REFER TO 3/A3.A AND 1/S1.A FOR LOCATION.







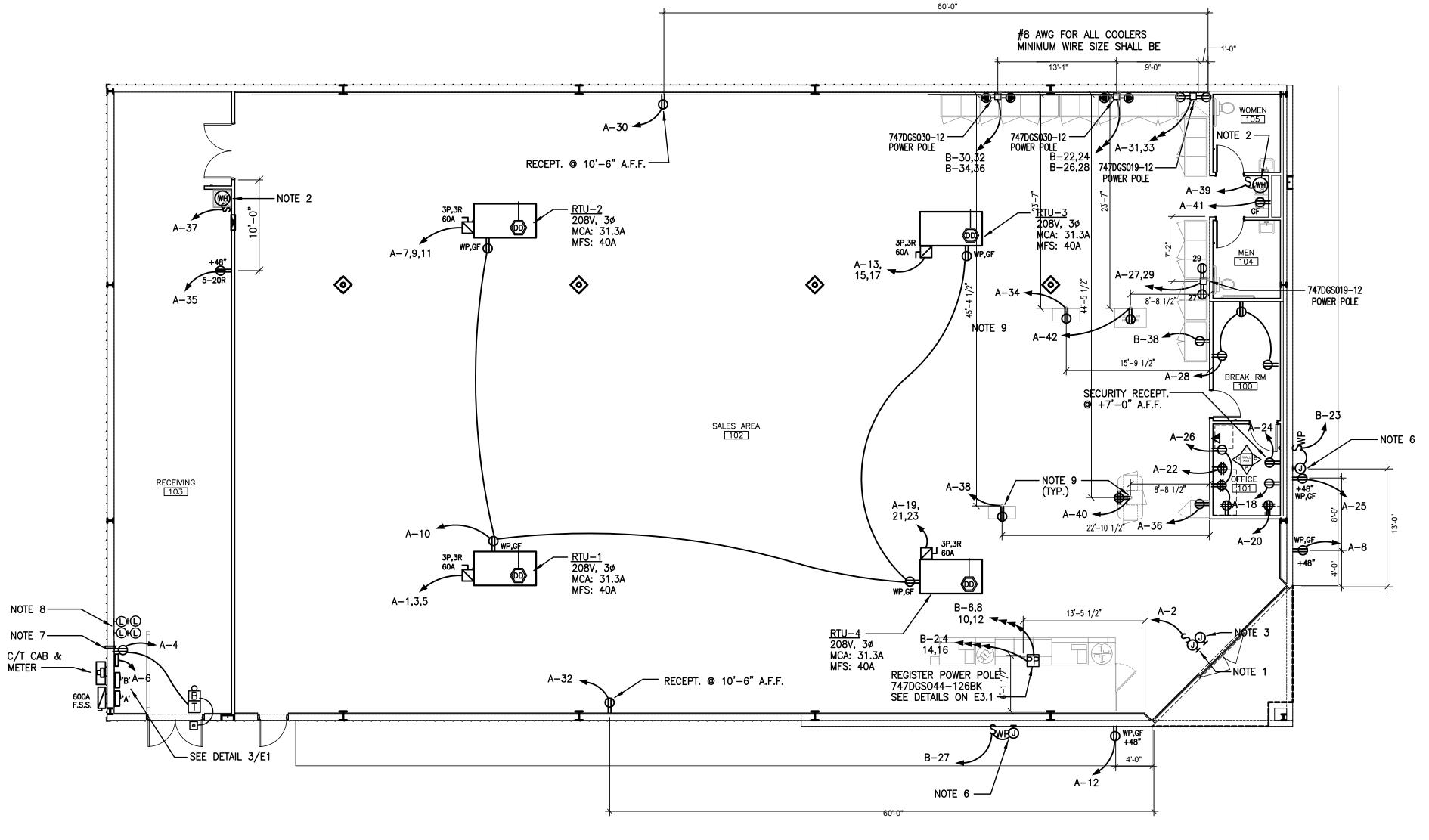


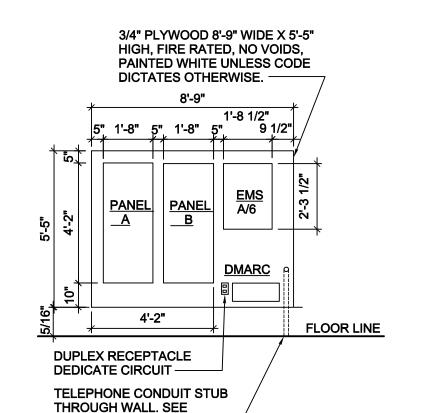
OFFICE WALL D

# **OFFICE ELEVATIONS**

# **LEGEND**

- BUZZER TORK MDL #TA725 W/ TRANSFORMER MDL#TA592
- 125/250V NEMA L14-20-R
- 4 PRONG TWIST LOCK 125V NEMA 5-20R DUPLEX.
- PANEL/CIRCUIT IN PANEL
- **└**☐ DISCONNECT
- POWER POLE
- PHONE JACK @ REGISTER
- RJ-11, RJ-45 DATA JACK, PHONE COMBO @ OFFICE





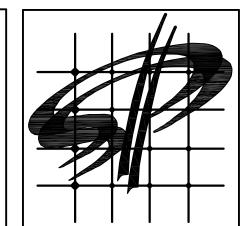


**ELECTRICAL SPECIFICATION** 

NOTE 'E' AND 'H'. —

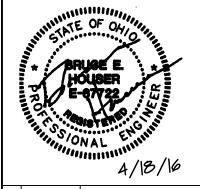
# FLOOR PLAN - POWER **E1** $\int 1/8" = 1' - 0"$

- 1. J. BOX FOR AUTOMATIC DOOR POWER MOUNTED ABOVE CEILING.
- 2. WATER HEATER, 120V, 1ø, 1.6 KW, PROVIDED BY MECH. CONTR., WIRED BY E.C. PROVIDE A 20A, 1P DISC. SWITCH. COORD. MOUNTING HEIGHT WITH
- 3. J. BOX FOR CCTV MOUNTED AT 12" ABOVE LAY-IN CEILING AND CENTERED ABOVE DOORS. TIE INTO SECURITY CIRCUIT IN THE OFFICE. SEE A2.1 FOR DETAILS.
- 4. MODULAR JACK WITH RJ-11/RJ-45 JACKS IN COMBO OUTLET WITH TWO 24 GA, 4 TWISTED PAIR CAT 5 CABLE. CABLE SHALL BE RUN TO REGISTER LOCATION WITH 20' EXTRA COILED CABLE. PROVIDE AN RJ-45 MALE FITTING ON THIS END.
- 5. DUCT SMOKE DETECTOR PROVIDED AND INSTALLED BY MECHANICAL CONTRACTOR, POWER WIRING BY ELEC. CONTRACTOR. MECH. CONTRACTOR SHALL PROVIDE AND INSTALL REMOTE AUDIBLE/VISUAL ANNUNCIATOR FOR DUCT DETECTOR. VERIFY LOCATION OF ANNUNCIATORS WITH OWNER'S REPRESENTATIVE.
- 6. PROVIDE A JUNCTION BOX FOR EXTERIOR TENANT SIGN. COORDINATE EXACT LOCATION WITH ARCHITECTURAL ELEVATIONS. MOUNT JUNCTION BOX ON INSIDE OF PARAPET WALL. PROVIDE A WEATHERPROOF DISCONNECT SWITCH.
- 7. PROVIDE A 1 1/2" RIGID PIPE SLEEVE THROUGH WALL FOR TELEPHONE SERVICE ENTRANCE WIRING. E.C. SHALL SEAL PENETRATION AFTER TELEPHONE SERVICE IS INSTALLED.
- 8. REMOTE DUCT SMOKE DETECTOR ANNUNCIATORS. VERIFY LOCATION WITH OWNER'S REPRESENTATIVE. MOUNT ANNUNCIATORS AT +6'-0" A.F.F. LABEL ANNUUNCIATORS AS TO UNIT SERVED.
- 9. PROVIDE J. BOX AT STRUCTURE WITH WHITE SO CORD DOWN TO RECEPTACLE AT COOLER. PROVIDE J. BOX AT CEILING WITH THREADED HUB AND STRAIN RELIEF CONNECTOR AND A BOX LISTED FOR PENDANT CORD SUPPORT WITH A THREADED STRAIN RELIEF CONNECTOR AT BOX. PROVIDE CORD LENGTH TO HANG RECEPTACLE AT +24" A.F.F. VERIFY M.H. WITH OWNER.



STORE PLANNING Inc. 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997

**BRUCE HOUSER P.E.** 1900 Abbott St. #105 Charlotte, NC 28203 Ph: 704-395-2705 Fax: 704-362-0904



# DATE | REVISION

0  $\overline{\phantom{a}}$ 

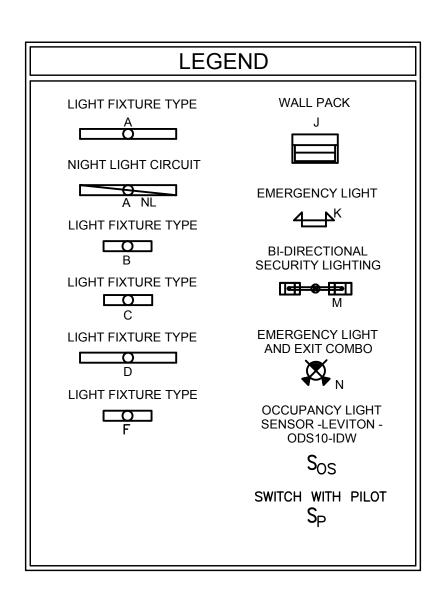
GEI ON LE, SHV 0

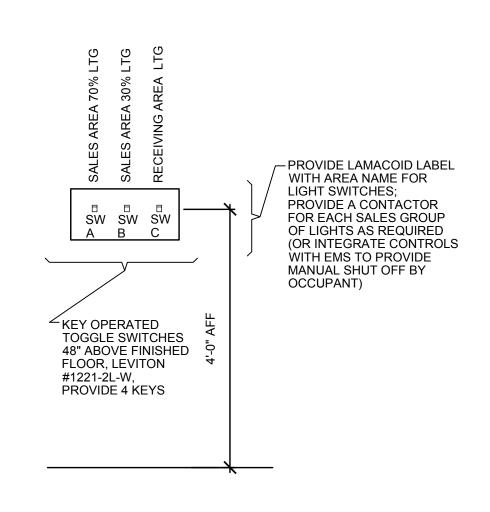
0

SPI Client DATE

> 16137 04-18-16

SHEET NUMBER

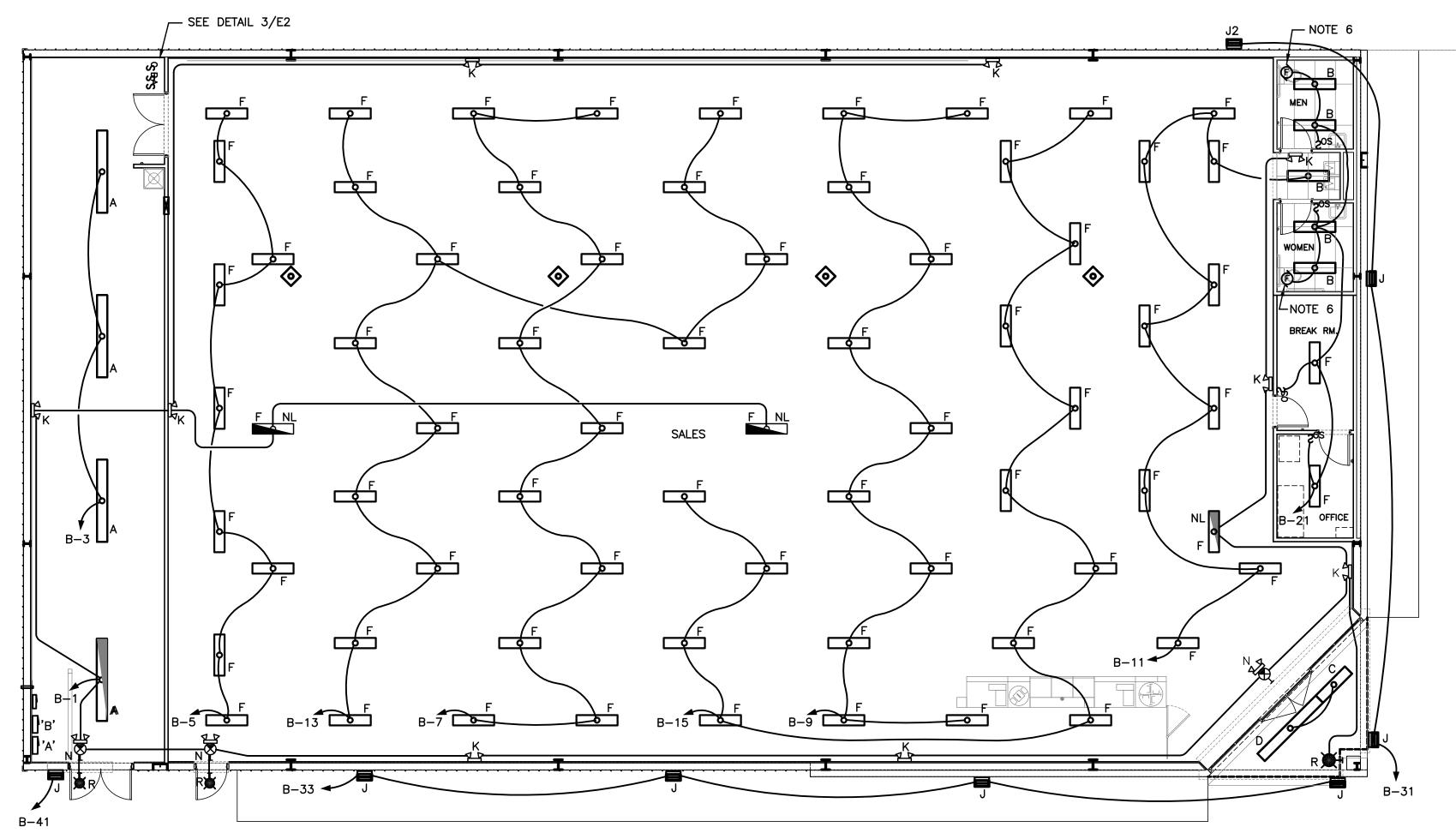






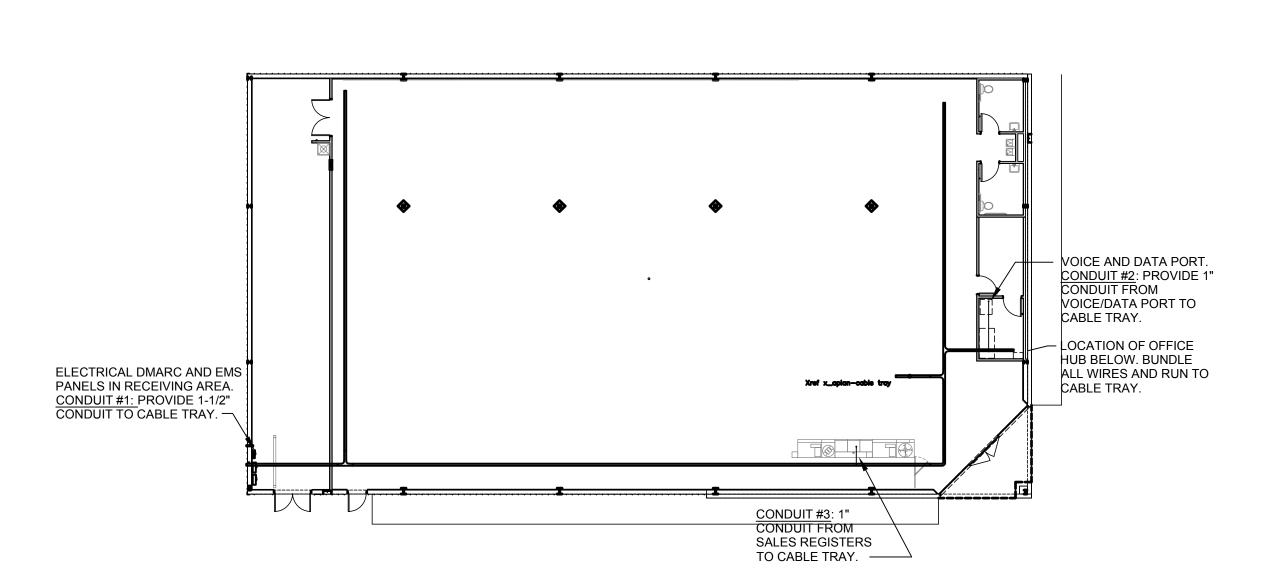
					İ	Ì
SYMB	TYPE	MANF	PART#	DESCRIPTION	COUNT	WATT
	A	ORION	MFSBC8424T8HI-120	8' STRIP (2) LAMPS: (T8/28W)	4	56
	``	LITHONIA	TZ-1-32-MVOLT-GEPIS	0 011(11 (2) E/(WII 0. (10/20W)		
	В	ORION		4' STRIP 40W LED	5	40
		ORION   MFSBC8424T8HI-120   B' STRIP (2) LAMPS: (T8/28W)				
	С	ORION	PFSBC4424T8HI-120	4' STRIP (2) LAMPS: T8/28W LAMP	0	56
	TYPE					
	CF	ORION	PFSBC4424T8HI-120	4' STRIP (2) LAMPS:T8/28W	1	56
		LITHONIA	Z-2-32-MVOLT-GEPIS	BODINE B50U EMERGENCY		
	D	ORION	MFSBC8444T8HI-120T	8' STRIP (4) LAMPS: T8/28W LAMP	1	114
		LITHONIA	Z-2-32-MVOLT-1/4-GEPIS	0 011(ii (4) D (iii 0.10/2011 D (iii )		'''
	F	HARRIS	MFSRSR334T8HW	/' STDID (3)   AMDS: T8/28W   AMD	71	96
		LITHONIA		4 311(1) (3) LAWI 3.10/20W LAWI .		
		ORION	MFHID-WP-150MH	WALL PACK 150W MH	7	150
		LITHONIA	TWH-150M-TB-SCWA-LPI	White Process in the second se	,	
	.12	ORION	MFHID-WP-50MH	WALL PACK 50W MH	1	50
	52	LITHONIA	TWH 50M-TB-SCWA-LPI	WILL I NOR SOW IN I		
ΔΔ	к	ORION	MFEF-2L	EMERGENCY LIGHT (2) HEADS	7	20
	'`	LITHONIA	EU2-LED-M12	EMERGENOT EIGHT (2) TIEARS	'	
<u> </u>	KE	ORION	MFEF-2L-WET	EMERGENCY LIGHT (2) HEADS	2	20
		LITHONIA	WLTU-LED	EWENGENCY EIGHT (2) TIEADS		20
<b>X</b>	l N	ORION	MFEXIT2LPDUAL	EMEDOENCY LIQUIT/EVIT COMPO	3	6
		LITHONIA	ECR-LED-M6			
$\bigcirc$	N 1	ORION	MFEXITRED	EXIT LIGHT RED	0	6
$\otimes$	14.1	LITHONIA	EXR-LED-EL-M6			
어	S	ORION	W/ 25' SQUARE STEEL	POLE MOUNTED 400W MH	0	400
<del>-</del>	S2	ORION	TWIN W/ 25' SQUARE	TWIN POLE MOUNTED 400W MH	2	400

REQUIRED NATION	AL ACCOUNT VENDORS	S	
COMPANY	CONTACTS	PHONE #	REQUIRED ITEMS
D&P CUSTOM LIGHTING	NATIONAL ACCOUNT SALES	800-251-2200	CUSTOM POWER POLES
EMERSON CLIMATE TECHNOLOGIES	WEBSITE: http://dollargeneralbid.ectsolutions.net		EMS SUPPLIER NOTE: CUSTOMIZED DOLLAR GENERAL EMS PANEL REQUIRES STORE #, CITY, STATE, ZIP CODE & QTY. OF HVAC UNITS OF THE INSTALL SITE WHEN ORDERING.
ORION ENGINEEERED SYSTEMS	BRENDAN HARTT	904-380-5033 bhartt@oesx.com	ELECTRICAL LIGHTING SUPPLIES AL,AR,AZ,CA,CO,FL,GA,KY,LA, MS,NC,NM,NV,OK,SC,TN,TX,VA,WV



# 1 FLOOR PLAN - LIGHTING **E2** 1/8" = 1' - 0"

- 1. ALL 4' FLUORESCENT LIGHTING FIXTURES SHALL BE TYPE 'F' UNLESS NOTED
- 2. SEE ARCHITECTURAL DETAILS FOR FIXTURE MOUNTING DETAILS.
- 3. REFER TO ARCHITECTURAL REFLECTED CEILING PLAN FOR EXACT LOCATIONS OF ALL FIXTURES.
- 4. MOUNT ALL EXIT AND EMERGENCY LIGHT FIXTURES AT 9'-0" A.F.F. TO CENTER.
- 5. CIRCUIT EMERGENCY BALLAST AHEAD OF AUTOMATIC SWITCHING.
- 6. TOILET EXHAUST FAN, 49W, 120V, SWITCHED WITH LIGHTS.



COMMUNICATION RACEWAY DETAIL **E2** 1/16" = 1' - 0"

STORE PLANNING Inc. 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997

BRUCE HOUSER P.E. 1900 Abbott St. #105 Charlotte, NC 28203 Ph: 704-395-2705 Fax: 704-362-0904

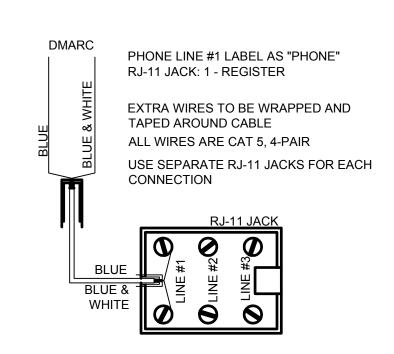


# DATE REVISION

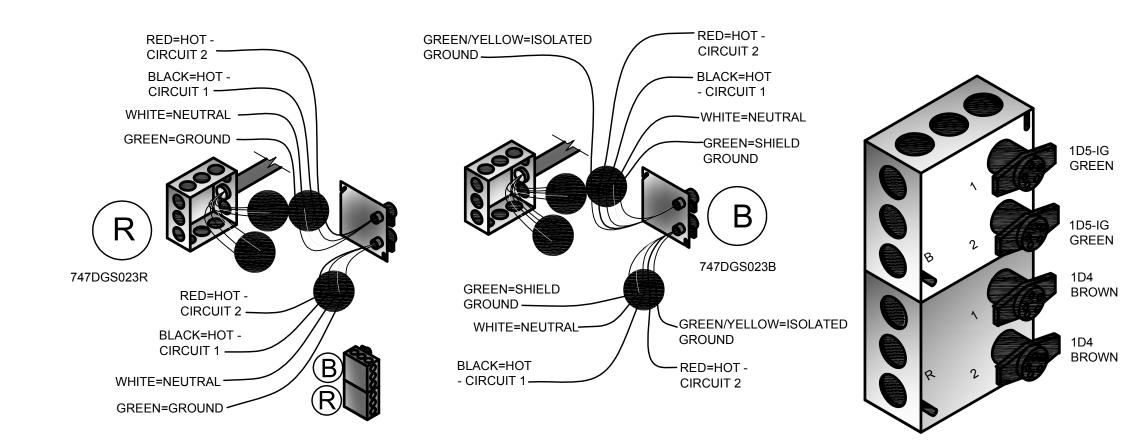
DOLLAR GENERAL #1743 499 LONG STREET ASHVILLE, OHIO 43103

DATE SPI Client 16137 | 04-18-16

SHEET NUMBER





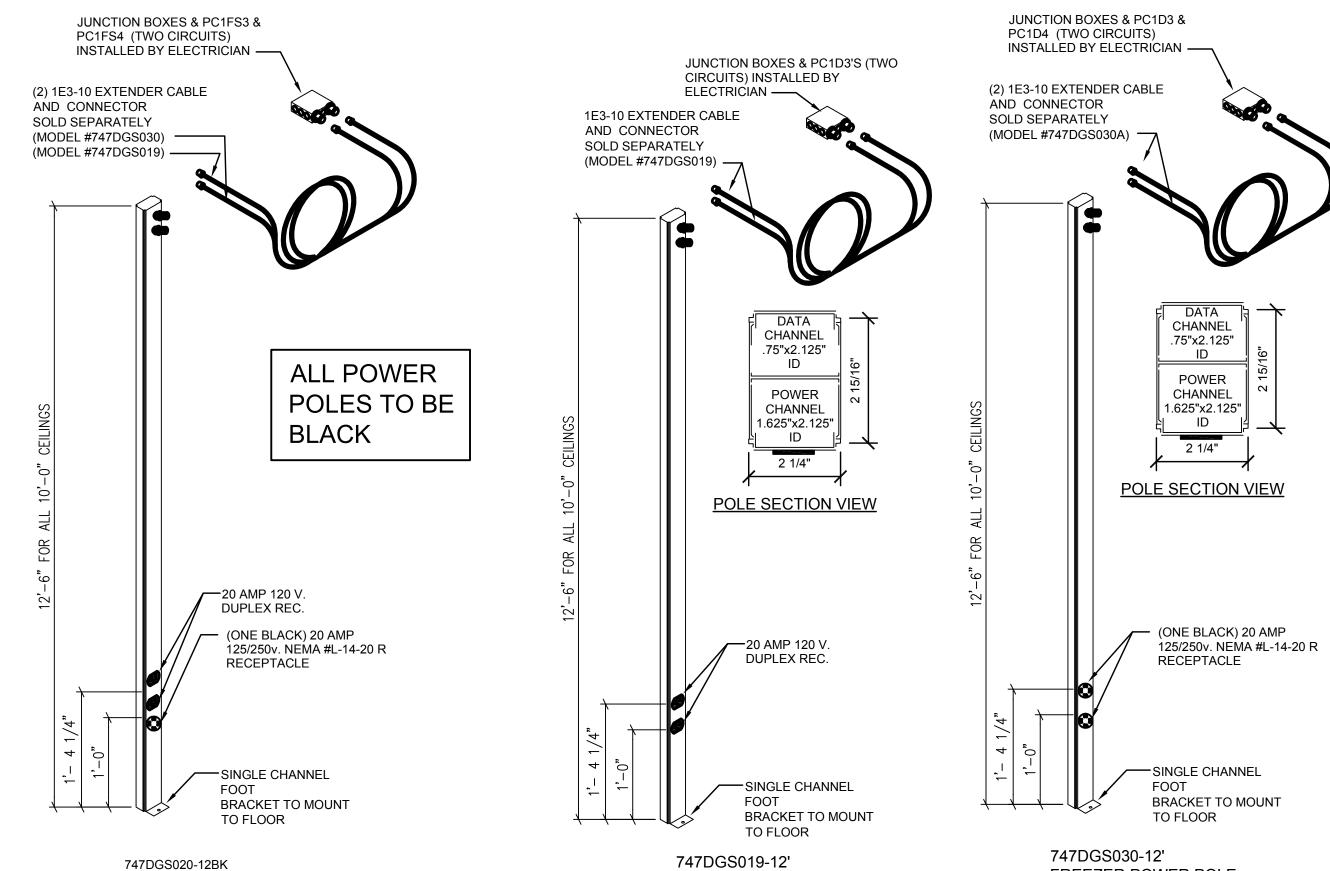


\*NOTE: BEFORE ORDERING AND INSTALLATION OF ELECTRICAL COMPONENTS FOR REGISTERS, CONSULT FINAL FIXTURE PLAN FOR NUMBER AND LOCATION.

MAXIMUM CIRCUITS FOR REGISTERS -CIRCUITS AT MAIN REGISTER - (9) 110V CIRCUITS AT ISLAND REGISTER - (3) 110V

	REGIST	ER ELECTRICAL COMP	ONENTS
Qty.	D&P Part No.	Power Pole Description	National Account Provider
1	747DGS023B	Dual circuit power kit with isolated ground	D & P
1	747DGS023R	Dual circuit power kit	D&P
1	747DGS044-126BK	12' 2CH Regular Pole W/2-C & 1-D Connector DRW #2004-12	
1	747DGS032A	10' Cable Kit (Set of 4 whips)	





COOLER/F	REEZER POWER POLES
D&P Part No.	Power Pole Description
747DGS030A	125/250 Cable kit for freezer
747DGS019A	Cable kit for 120 volt cooler
747DGS020-12BK	125/250 volt Power pole with NEMA L1420 connection
	120 Volt 1 CIR. Power pole

COOLER/FREEZER POWER POLE

R POLES
Description 20 volt cooler . Power pole pole with NEMA kit for freezer

**COOLER POWER POLE** 

FREEZER POWER POLE

REG. POWER (BY ELECTRICIAN)—— FOUR EACH 1E3-10 EXTENDER CABLE **ALL WHIPS** AND CONNECTOR SOLD SEPARATELY ARE TO BE (MODEL POWER POLE #747DGS044-126BK OPEN CEILINGS OR #747DGS032A) 10'-0" CEILINGS HIGHER THAN 10' WILL REQUIRE HIGHER POWER POLES

4 REGISTER POWER POLE
E3.1 NO SCALE

STORE PLANNING Inc. 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997

**BRUCE HOUSER P.E** 1900 Abbott St. #105 Charlotte, NC 28203 Ph: 704-395-2705 Fax: 704-362-0904



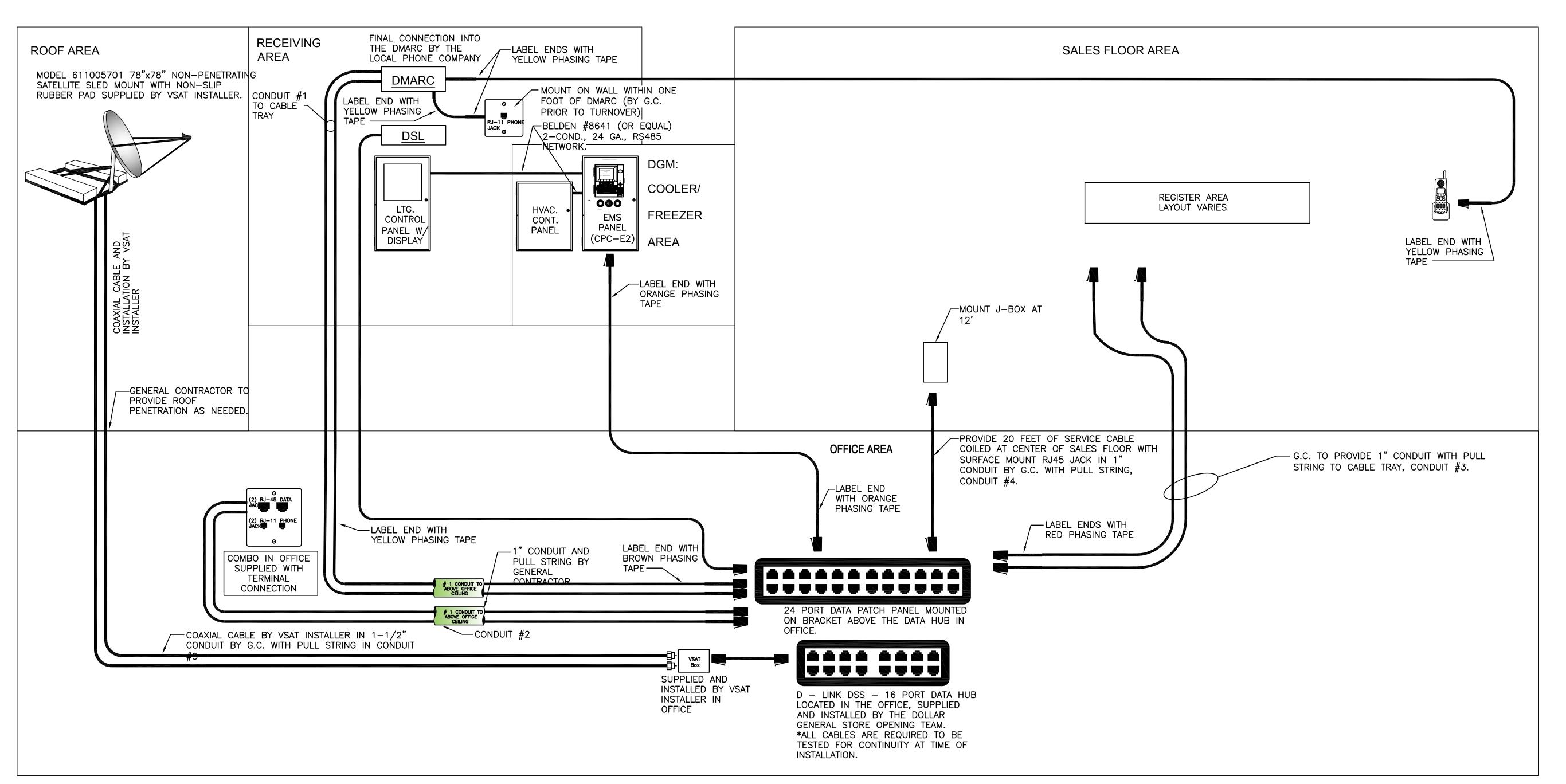
# DATE REVISION

DOLLAR GENERAL 499 LONG STRE ASHVILLE, OHIO

SPI Client DATE 04-18-16

SHEET NUMBER

COOLER/FREEZER POWER POLE 3 COO E3.1 NO SCALE



CONDUIT NUMBER	START	END	SIZE	CONDUIT	RESPONSIBILITY	*CABLING RESPONSIBILITY
1	RECEIVING AREA	CABLE TRAY	1-1/	2"	GENERAL CONTRACTOR	LOW VOLTAGE VENDOR
2	OFFICE VOICE / DATA	OFFICE (HUB)	1"		GENERAL CONTRACTOR	LOW VOLTAGE VENDOR
3	PORT OFFICE (HUB)	CABLE TRAY	1"		GENERAL CONTRACTOR	LOW VOLTAGE VENDOR
4	CENTER OF SALES FLOOR CONNECTION	OFFICE (HUB)	1"		GENERAL CONTRACTOR	LOW VOLTAGE VENDOR
5	SATELITE	OFFICE (HUB)	1-1/	2"	GENERAL CONTRACTOR	LOW VOLTAGE VENDOR

\*UNLESS OTHERWISE NOTED, ALL RESPONSIBILITIES SHOULD FOLLOW THIS CHART.

ALL CABLES AT THE OFFICE WILL NEED TO BE WRAPPED IN PHASING TAPE CONSISTENT WITH THE FOLLOWING COLORS:

ALL CABLES AT THE OFFICE WILL NEED TO BE WRAPPED IN PHASING TAPE CONSISTENT WITH THE FOLLOWING COLORS:

RED TAPE CASH REGISTER DATA BLUE TAPE \_\_\_\_\_ ELEC. EMS DATA

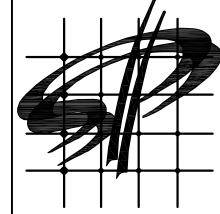
BROWN TAPE ——— OFFICE DATA

ORANGE TAPE ——— COOLER/FREEZER EMS DATA YELLOW TAPE PHONE CABLE TO DMARC

Wire Symbols —— RJ-45: 24 GA., 4 TWISTED PAIR, CATEGORY-FIVE (CAT 5) DATA CABLE WITH **■** M9DYLAR24RJGA4.5 4END.

TWISTED PAIR, CATEGORY-FIVE (CAT 5) DATA CABLE WITH MODULAR RJ-11 END. USE ONLY THE BLUE & WHITE AND SOLID BLUE WIRES. ALL OTHER WIRES TO BE FOLDED BACK AND TAPED TO CONNECTOR

- A. WHEN LOW VOLTAGE PERMITS ARE REQUIRED, THE GC/DEVELOPER/LLD IS RESPONSIBLE FOR OBTAINING ALL LOW VOLTAGE PERMITS.
- LOW VOLTAGE VENDOR RESPONSIBLE FOR ALL WIRE MANAGEMENT IN CABLE TRAY.
- GC TO PROVIDE AND INSTALL CABLE TRAY AND ALL CONDUIT.



STORE PLANNING Inc. 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997

BRUCE HOUSER P.E. 1900 Abbott St. #105 Charlotte, NC 28203 Ph: 704-395-2705 Fax: 704-362-0904



		4/18/16
#	DATE	REVISION
		<del></del>

G STREFOUND 4( DOLLAR GENERAL 3 499 LONG STRE ASHVILLE, OHIO 4

PLAN

DATE SPI Client 16137 | 04-18-16

SHEET NUMBER

					PAN	EL: ',	Δ,					
1	20 / 208 VOLTS 3 PHASE MOUNTING: SURFACE TYPE:		RE				PAN	NELBOA	ARD ASS		RATING 10 KAIC RMS SYMM S: 400 MAIN LUGS ONLY	
(T. lo.	LOAD SERVED	WIRE SIZE	TRIP	POLE	A	KVA LOAD B	С	POLE	TRIP	WIRE SIZE	LOAD SERVED	CKT. No.
1					3.0/ .9			1	20*	10	AUTOMATIC DOOR	2
3	HVAC - 1	8	40	3		3.0/ .4		1	20*	12	TELE. REC.	4
5							3.0/ .3	1	20*	12	EMS PANEL	6
7 9					3.0/ .9			1	20	10	OUTSIDE VENDING REC.	8
9	HVAC - 2	8	40	3		3.0/ .7		1	20	10	OUTSIDE HVAC RECEPT.	10
11							3.0/ .4	1	20	10	OUTSIDE REC.	12
3					3.0/ –			1	20	_	SPARE	14
5	HVAC - 3	8	40	3		3.0/ –		1	20	_	SPARE	16
7							3.0/ .5	1	20	10	INTERFACE EQUIP.	18
9					3.0/ .5			1	20	10	VSAT HUB EQUIP.	20
21	HVAC - 4	8	40	3		3.0/1.0		1	20	10	CCTV RECEPT.	22
23							3.0/ .4	1	20	10	SECURITY RECEPT.	24
25	SPARE	_	20	1	- / .6			1	20	10	OFFICE RECEPT.	26
27	REACH-IN COOLER	8	20*	1		1.2/ .6		1	20	10	BREAK ROOM REC.	28
29	REACH-IN COOLER	8	20*	1			1.2/ .4	1	20	10	SALES RECEPT.	30
31	REACH-IN COOLER	8	20*	1	1.2/ .4			1	20	12	SALES RECEPT.	32
33	REACH-IN COOLER	8	20*	1		1.2/ .7		1	20*	10	ICE CREAM PP	34
35	FREEZER	10	20*	1			1.6/ .7	1	20*	10	GATORADE PP	36
37	WATER HEATER	12	20	1	1.7/.7			1	20*	10	SODA COOLER	38
39	WATER HEATER	12	20	1		1.7/ .7		1	20*	10	SODA COOLER	40
41	EWC	12	20	1			.7 / .7	1	20*	10	SODA COOLER	42
			TOT	ALS	31.1	31.8	30.6	KVA				

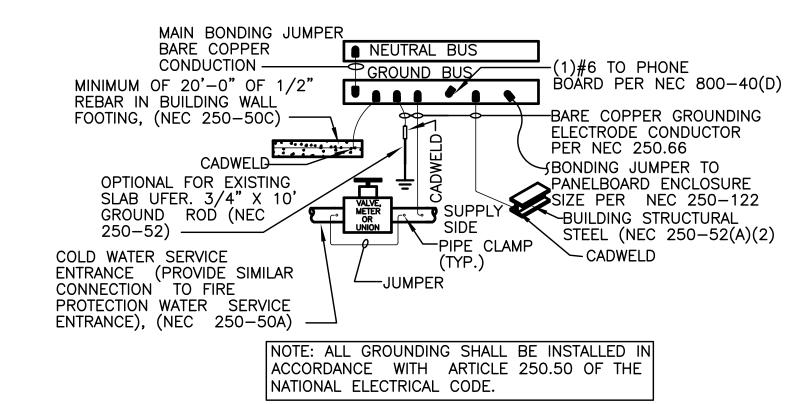
1. PROVIDE PANEL WITH FEED-THRU LUGS TO FEED PANEL 'B'.

4. '\*' INDICATES CIRCUIT BREAKER WITH A LOCK-ON HANDLE.

2. '\*' INDICATES BREAKER WITH A LOCK-ON HANDLE.

3. TOTAL LOADS INCLUDE PANEL 'B' LOADS.

	20 / 208 VOLTS 3 MOUNTING: SURFACE			RE				PAN	NELBOA	ARD ASS		RATING 10 KAIC RMS SYMM INS: 150A MAIN BRKR.	
CKT. No.	LOAD SERVED		WIRE SIZE	TRIP	POLE	A	KVA LOAD B	С	POLE	TRIP	WIRE SIZE	LOAD SERVED	CK1 No.
1	EXIT/NIGHT LIGHTS	(EMS)	12	20*	1	.6 / .8			1	20	10	CASH REG. BROWN	2
3	RECEIVING LTS.	(EMS)	12	20	1		.2 / .8		1	20	8	CASH REG. BROWN	4
5	SALES AREA LTS.	(EMS)	12	20	1			1.0/ .8	1	20	10	CASH REG. GREEN (IG)	6
7	SALES AREA LTS.	(EMS)	10	20	1	1.0/ .8			1	20	12	CASH REG. GREEN (IG)	8
9	SALES AREA LTS.	(EMS)	10	20	1		1.3/ .8		1	20	10	CASH REG. GREEN (IG)	10
11	SALES AREA LTS.	(EMS)	10	20	1			1.0/ .8	1	20	10	CASH REG. GREEN (IG)	12
13	SALES AREA LTS.	(EMS)	10	20	1	1.0/ .8			1	20	10	CASH REG. BROWN	14
15	SALES AREA LTS.	(EMS)	10	20	1		.9 / .8		1	20	12	CASH REG. BROWN	16
17	SPARE	(EMS)	10	20	1			_ / .7	1	20	_	SPARE	18
19	SPARE	(EMS)	10	20	1	_ / .4			1	20	_	SPARE	20
21	BREAK RM LTS.	(EMS)	10	20	1		.9 / 1.6		2	20*	8	REACH-IN FREEZER	22
23	BUILDING SIGN	(EMS)	10	20	1			1.2/1.6				NEAGH IIV TREEZER	24
25	PYLON SIGN	(EMS)	10	20	1	.9 / 1.6			2	20*	8	REACH-IN FREEZER	26
27	BUILDING SIGN	(EMS)	10	20	1		.8 / 1.6					NEXOTI IIV TREEZER	28
29	SPARE	(EMS)	10	20	1			<u> </u>	2	20*	8	REACH-IN FREEZER	30
31	EXTERIOR WALLPAKS	(EMS)	12	20	1	.5 / 1.6						NEXOTI IIV TREEZER	32
33	FRONT WALL-PAKS	(EMS)	10	20	1		.3 / 1.6		2 2	20*	8	REACH-IN FREEZER	34
35	SITE LIGHTING	(EMS)	10	20	1			1.3/1.6				NEXOTI IIV TREEZER	36
37	SITE LIGHTING	(EMS)	10	20	1	1.3/ .9			1	20*	10	REACH-IN COOLER	38
39	SPARE	(EMS)	10	20	1		_/_		1	20	_	SPARE	40
41	SECURITY LTS.	(EMS)	12	20	1			.1 / –	1	20	_	SPARE	42





# **GENERAL NOTES:**

 ALL ELECTRICAL WORK SHALL BE IN ACCORDANCE WITH THE 2011 NATIONAL ELECTRICAL CODE AND ALL LOCAL AND STATE CODES.

TOTAL CONNECTED KVA 93.5

TOTAL DEMAND AMPS 262A

94.2

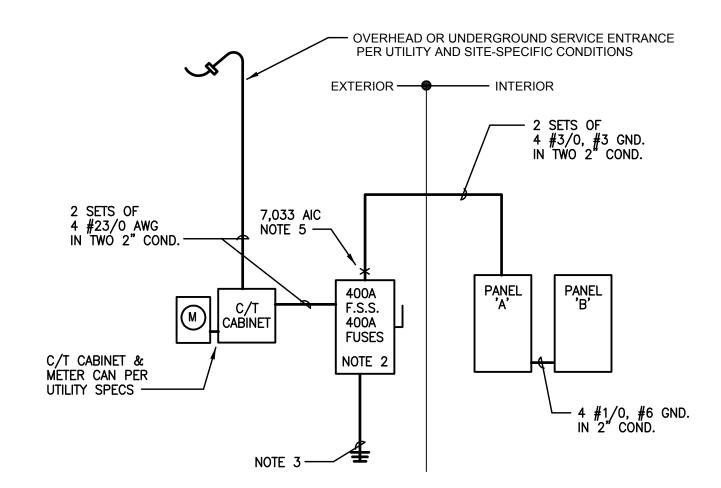
3. –

TOTAL DEMAND KVA

- 2. ALL ELECTRICAL MATERIALS, DEVICES, APPLIANCES AND EQUIPMENT SHALL BE LABEL LISTED BY A LOCALLY APPROVED THIRD PARTY TESTING AGENCY.
- 3. ALL ELECTRICAL PERMITS AND INSPECTION FEES SHALL BE OBTAINED AND PAID FOR BY THE ELECTRICAL CONTRACTOR.
- 4. DRAWINGS ARE DIAGRAMMATIC ONLY AND INDICATE ONLY THE GENERAL ARRANGEMENT. SEE ARCHITECTURAL DRAWINGS FOR EXACT DIMENSIONS.
- 5. ELECTRICAL CONTRACTOR SHALL GUARANTEE ALL WORK AND MATERIALS FOR ONE YEAR EFFECTIVE THE DAY THE PROJECT IS ACCEPTED BY THE OWNER.
- 6. ELECTRICAL CONTRACTOR SHALL MAKE ALL ELECTRICAL POWER CONNECTIONS TO HVAC, PLUMBING AND OTHER EQUIPMENT AS REQUIRED.
- 7. A COMPLETE GROUNDING SYSTEM SHALL BE PROVIDED AND INSTALLED IN ACCORDANCE WITH ARTICLE 250 OF THE NEC, AND AS SHOWN ON THE DRAWINGS.
- 8. ALL CUTTING AND PATCHING OF WALLS AND FLOORS FOR ELECTRICAL EQUIPMENT SHALL
- 9. ALL WIRING SHALL BE INSTALLED IN GALVANIZED RIGID CONDUIT, INTERMEDIATE METAL CONDUIT, OR EMT. EMT SHALL NOT BE USED IN OR UNDER CONCRETE SLABS, OR IN MASONRY WALLS. MC CABLE WILL BE ACCEPTABLE FOR BRANCH CIRCUITS. USE PVC CONDUIT
- 10. CONDUCTORS SHALL BE COPPER RATED AT NOT LESS THAN 600 VOLTS. MINIMUM SIZE SHALL BE NO. 14 AWG UNLESS OTHERWISE NOTED ON THE DRAWINGS. ALL WIRE #8 AWG AND LARGER SHALL BE STRANDED, #10 THRU #12 AWG CONDUCTORS SHALL BE SOLID. USE THE 75°C AMPACITY RATING FOR CONDUCTORS. ALL LUGS SHALL BE LISTED
- BE SOLID. USE THE 75°C AMPACITY RATING FOR CONDUCTORS. ALL LUGS SHA AND LABELED FOR 75°C.
- 11. ALL CONDUCTORS SHALL USE TYPE THWN OR THHN INSULATION.

BE THE RESPONSIBILITY OF THE ELECTRICAL CONTRACTOR.

- 12. PROVIDE A PULLWIRE IN ALL EMPTY CONDUITS.
- 13. PROVIDE A TYPED DIRECTORY IN ALL PANELBOARDS CLEARLY DESCRIBING THE LOCATION OF AND TYPE OF LOAD BEING SERVED FOR ALL CIRCUITS.
- 14. PROVIDE ENGRAVED PHENOLIC NAMEPLATES FOR ALL PANELBOARDS AND DISCONNECT SWITCHES, WHITE LETTERS ON BLACK BACKGROUND.
- 15. FUSES 0 600 AMPS SHALL BE UL CLASS "RK-5" LOW PEAK DUAL ELEMENT TIME DELAY WITH 100,000 AMPERE INTERUPTING RATING AS MANUFACTURED BY BUSS.
- 16. ALL TERMINALS, SPLICING CONNECTORS, LUGS, ETC SHALL BE IDENTIFIED FOR USE WITH THE MATERIAL (CU/AL) OF THE CONDUCTOR AND SHALL BE PROPERLY INSTALLED.
- 17. THE ELECTRICAL CONTRACTOR SHALL BE RESPONSIBLE FOR PROTECTING ALL ELECTRICAL EQUIPMENT FROM FOREIGN MATERIAL DURING CONSTRUCTION (PAINT, SPACKLE, ETC.).
- 18. COMBINING OF CIRCUITS IN CONDUITS SHALL COMPLY WITH NEC REQUIREMENTS FOR CONDUIT FILL. ALLOW FOR DERATING WHERE REQUIRED FOR NUMBER OF CONDUCTORS. ALL PHASE CONDUCTORS THAT SHARE A NEUTRAL SHALL BE FED FROM A COOMON TRIP BREAKER OR SHALL HAVE A COMMON HANDLE TIE TO DISCONNECT ALL PHASE CONDUCTORS SHARING THE NEUTRAL.



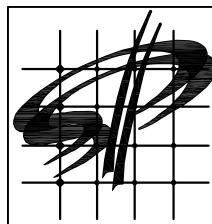
TOTAL DEMAND AMPS | 102A



# NOTE

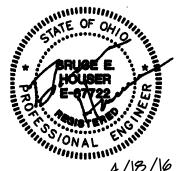
- 1. COORIDNATE WITH ELECTRIC UTILITY TO OBTAIN NEW UNDERGROUND 120/208V, 3ø 4W SERVICE. E.C. SHALL PROVIDE CONDUIT AND METER CAN PER UTILITY SPECIFICATIONS.
- 2. PROVIDE A 400A, 3P, 3R HD FUSED DISCONNECT SWITCH WITH 400 AMP CURRENT LIMITING FUSES. SWITCH SHALL BE U.L. LISTED FOR SERVICE ENTRANCE USE.
- 3. PROVIDE A #1/0 GROUNDING ELECTRODE CONDUCTOR TO UNDERGROUND METAL WATERPIPE AND BUILDING STEEL AND A #4 AWG CONDUCTOR TO A DRIVEN GROUND ROD PER NEC 250-50.
- 4. SEE DETAIL 2/E1 FOR LOCATION AND ARRANGEMENT OF PANELS.
- 5. FAULT CURRENT WILL NOT EXCEED 7,033 AIC AT THIS POINT. E.C. SHALL FIELD VERIFY WITH THE UTILITY AND NOTIFY ENGINEER IF OTHERWISE.

LOAD	CONNECTED KVA	WINTER DEMAND KVA	SUMMER DEMAND KVA		
LIGHTS	11.4	14.3	14.3		
RECEPTACLES	14.4	12.2	12.2		
WATER HTR.	3.3	3.3	3.3		
REFRIGERATION	23.6	23.6	23.6		
RTUs	36.0	27.0	36.0		
MISC. EQ.	4.8	4.8	4.8		
TOTAL	93.5	85.2	94.2		
	TOT	AL DEMAND	94.2 KVA		
	тот	AL DEMAND AMPS	262 AMP		



STORE PLANNING Inc. 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997

BRUCE HOUSER P.E 1900 Abbott St. #105 Charlotte, NC 28203 Ph: 704-395-2705 Fax: 704-362-0904



	4/18/16								
	#	DATE	REVISION						
			1						

DOLLAR GENERAL #17434 499 LONG STREET ASHVILLE, OHIO 43103

ENANT

HEDULES AND RISER

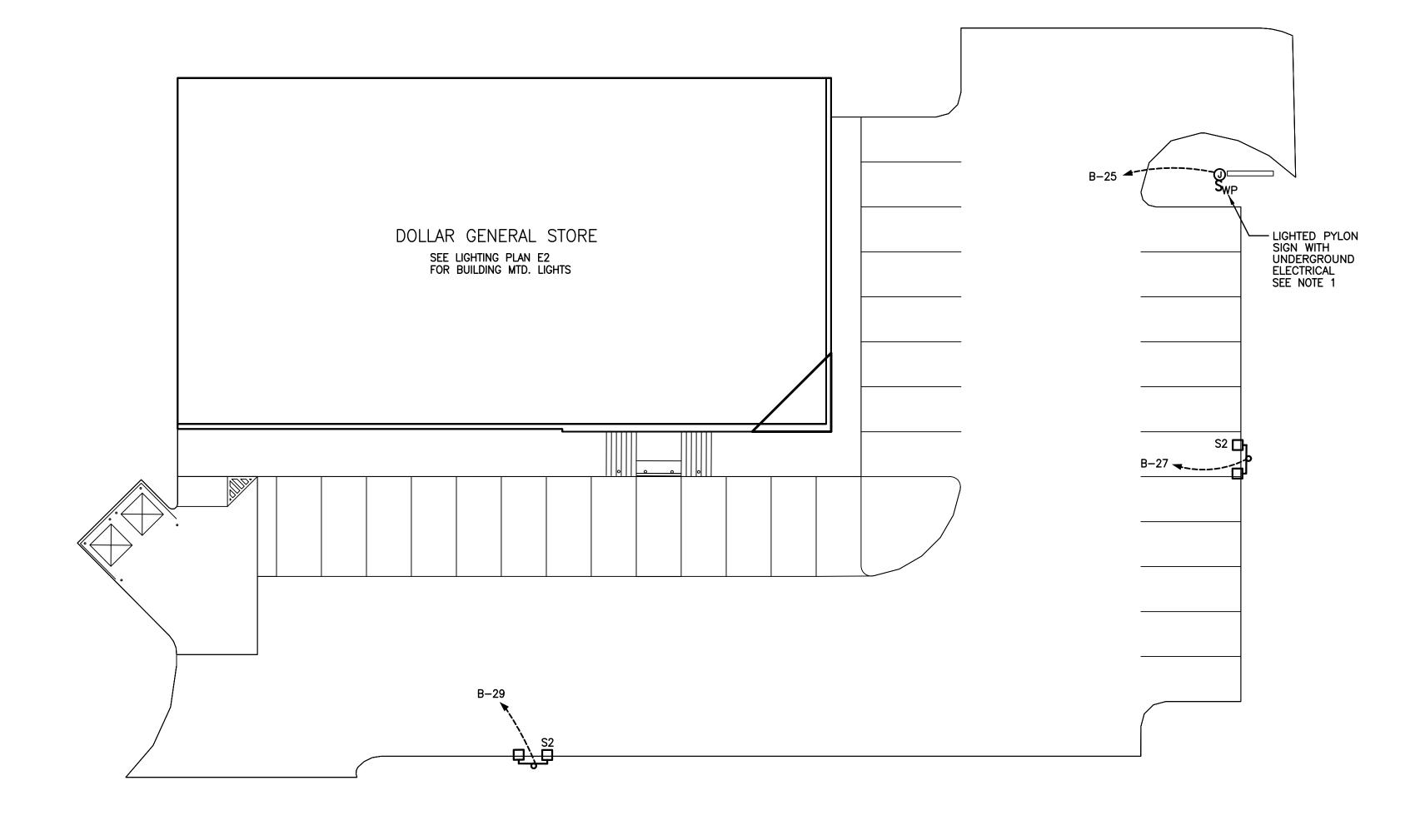
DOLLAR HEET TITLE PANEL SCHE

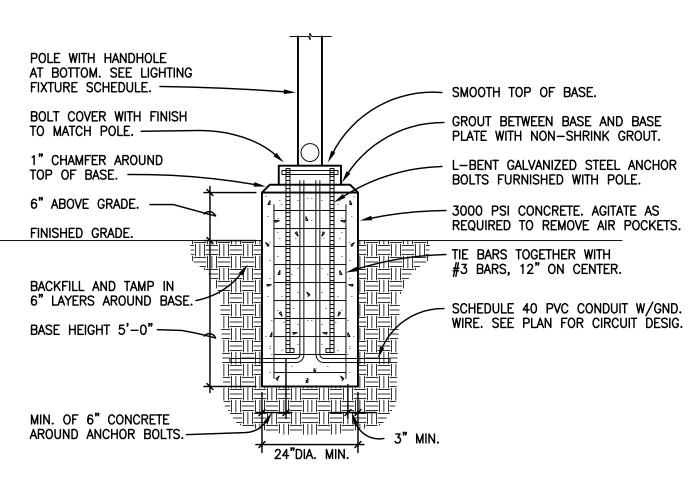
 SPI Client
 DATE

 16137
 04-18-16

SHEET NUMBER

E5





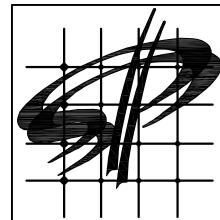
NOTE: ALLOW 30 DAYS FOR CONCRETE BASE TO CURE BEFORE INSTALLING POLE.





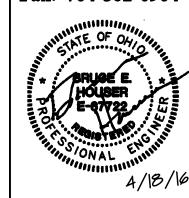
SITE LIGHTING

- 1. FINAL SIGN CONNECTION AND UNDERGROUND CONDUIT IS LANDLORD RESPONSIBILITY. PROVIDE CONDUIT FROM THE ELECTRICAL PANEL TO LOCATION OF THE PYLON SIGN BASE. BURY CONDUIT UNDER PARKING AREA. THE CONDUIT IS TO BE 1" AND HAVE TWO #10 AWG WIRE WITH #10 GROUND AND A 20-AMP SINGLE POLE BREAKER AT THE PANEL. A TEMPORARY 3" TALL STAKE SHALL BE PROVIDED TO DESIGNATE THE PYLON SIGN LOCATION UNTIL THE SIGN IS PERMANENTLY INSTALLED. REMOVE POST AFTER SIGN IS INSTALLED.
- 2. SITE / PARKING LOT LIGHTING: PROVIDE ADEQUATE POLE AND/ OR WALL LIGHTING FOR NIGHT VISION AROUND ENTRY, PARKING AND DUMPSTER PAD AREAS.
- 3. MINIMUM OF TWO FOOT-CANDLES REQUIRED FOR ALL PAVED AREAS EXCLUDING 15' PERIMETER FROM EDGE OF PAVEMENT.
- 4. ALL SITE LIGHTING AND PYLON CIRCUITS SHALL BE INSTALLED IN SCHEDULE 40 PVC ELECTRICAL CONDUIT, BURIED A MINIMUM OF 24" BELOW FINAL GRADE.
- 5. SEE LIGHTING PLAN E2 FOR CIRCUTING OF BUILDING MOUNTED LIGHTS.



STORE PLANNING Inc. 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997

BRUCE HOUSER P.E. 1900 Abbott St. #105 Charlotte, NC 28203 Ph: 704-395-2705 Fax: 704-362-0904



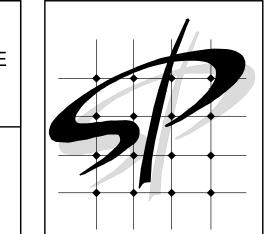
# DATE REVISION

DOLLAR GENERAL <sup>3</sup> 499 LONG STRE ASHVILLE, OHIO 4

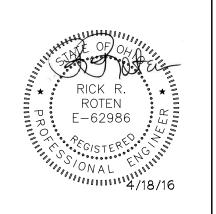
O

SPI Client DATE 16137 | 04-18-16

SHEET NUMBER



STORE PLANNING Inc 3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997



# DATE | REVISION

B. RUN CONDUIT FROM SENSORS TO BOTTOM OF STRUCTURE.

SUPPLIED | INSTALLED QTY. SYMBOL DESCRIPTION **CABLE TYPE** NOTES SUPPLIER AHU TERMINAL STRIP 8C T-STAT CABLE VERIFY BELDEN 8761 OR EQUIVALENT EMS SUPPLIER GENERAL CONTRACTOR OUTDOOR AIR TEMP (22AWG, 2C, STRANDED, SHIELDED) MTD. @ 8'-0" A.F.F. BELDEN 8761 OR EQUIVALENT EMS GENERAL CONTRACTOR SUPPLY TEMP (501-1121) (22AWG, 2C, STRANDED, SHIELDED) VERIFY SUPPLIER MTD. IN SUPPLY DUCT TEMPERATURE SPACE BELDEN 8761 OR EQUIVALENT VERIFY (22AWG, 2C, STRANDED, SHIELDED) SENSOR SUPPLIER CONTRACTOR (809-6590) MTD. @ 8'-0" A.F.F. 24 GA., 4 TWISTED-PAIR, CATEGORY-FIVE (CAT 5) DATA RJ-11/RJ-45 DATA JACK, GENERAL GENERAL CONTRACTOR CONTRACTOR PHONE COMBO. CABLÈ GENERAL GENERAL MOTION SENSOR SWITCH. LEVITON EZ-FIND ODS-10-IDW

SENSOR PLAN KEYED NOTES

ALWAYS INSTALL THESE SENSORS AT 8'-0" A.F.F. THE EXACT MOUNTING LOCATION OF THE HVAC SENSORS "TS" MAY VARY DEPENDING ON THE STORE LAYOUT & DUCT CONFIGURATION. REFER TO SITE SPECIFIC MECHANICAL DRAWINGS FOR HVAC ZONED SENSOR MOUNTING LOCATIONS. IF SENSORS ARE MOUNTED ON EXTERIOR WALLS DUE TO DUCT CONFIGURATION, THEY ARE THEN TO BE INSULATED TO PREVENT AIR INFILTRATION. IF ADDITIONAL HVAC UNITS ARE USED, ADD ADDITIONAL TEMPERATURE SENSORS "TS".

2 ADD ADDITIONAL FIFTH HVAC UNIT WHEN REQUIRED.

PHONE LINE #1 - TWO RJ-11 PORTS. ONE (1) LOCATED IN OFFICE W/RJ-45 DATA JACK COMBO AND ONE (1) AT REGISTER. 24 GA. CAT 5, 4-PAIR TWISTED WIRE ONLY. USE BLUE AND BLUE & WHITE WIRES. HOOK TO LINE #1 TERMINAL IN RJ-11 JACK EACH PHONE JACK TO HAVE DEDICATED, SEPARATE HOME RUN TO DMARC. LABEL AS "PHONE" AT THE DESTINATION AND AT DMARC. PHONE COMPANY PROVIDES FINAL HOOK UP TO DMARC ONLY.PHONE LINE #2 - RJ-11 PHONE JACK SUPPLIED AND WIRED BY CONTRACTOR.

A. REFER TO E1 FOR GENERAL CONTRACTOR RESPONSIBILITIES. E.C. MAY USE CABLE TRAY FOR LOW VOLTAGE CABLES, SEE 2/E2.

1 EMS/LOW VOLTAGE PLAN NOTE: PLAN IS DIAGRAMIC ONLY!! HOLD CONDUIT TIGHT TO EXPOSED MAIN GIRTS AND RUN AS HIGH AS POSSIBLE ALONG PERIMETER WALLS TO RECEIVING AREA.

SALES AREA 102

RTU-2 (AT)

RTU-1 (AT)

TO RTU-2

TO RTU-1

@ 8'-0" A.F.F.

EMERSON PRE-PROGRAMMED E2 CZ-100

"EMS PANEL", MTD. NEXT TO ELECTRICAL PANELS, AS CLOSE AS POSSIBLE.

ELECTRICAL PANELS

CONTROLLER

TO RTU-3 (TS)

RTU-3 (AT)

ST RTU-4

MEN

104

WOMEN

105

OFFICE

REFER TO SHEET E3.1 AND
 E4 FOR ADDITIONAL LOW
 VOLTAGE INFORMATION.

BREAK ROOM 100

PROVIDE AND INSTALL ONE (1) 24 GA., 4 TWISTED-PAIR, CATEGORY-FIVE (CAT5) DATA CABLE WITH

RJ-11/RJ-45 JACK AT OFFICE. RJ-45 CABLE TO BE RUN FROM JACK, TO REGISTER

MODULAR COMBO

IN CONDUIT.

ICE CREAM FREEZER

CONTRACTOR QTY. ONE (1) PER HVAC UNIT QTY. ONE (1) PER RECEIVING ENTRY. QTY. ONE (1) PER HVAC UNIT GENERAL QTY. ONE (1) PER HVAC UNIT QTY. ONE (1) AT OFFICE COMPUTER CART. QTY. ONE (1) PER MEN'S RESTROOM. CONTRACTOR CONTRACTOR QTY. ONE (1) PER WOMEN'S RESTROOM.

SPI Client DATE 16137 04-18-16

SHEET NUMBER

HVAC Control Wires To Utilize

Standard 8 Conductor, 18 Ga., Color Coated. See Photo This

AC#4 SPACE TEMP

AC#4 SUPPLY TEMP

AC#5 SPACE TEMP

AC#5 SUPPLY TEMP

AC#6 SPACE TEMP

AC#6 SUPPLY TEMP

COOLER TEMP.

COOLER TEMP.

FREEZER TEMP.

FREEZER TEMP.

FREEZER TEMP.

OUT1 OUT2 OUT3 OUT4 OUT5 OUT6 OUT7 OUT8

UT1 OUT2 OUT3 OUT4 OUT5 OUT6 OUT7 OUT8

DOOR SW FRON

DOOR SW EM./EXIT

DOOR SW RECEIV

LUNCH MEAT COOLER TEMP AC#1 SPACE TEMP

AC#1 SUPPLY TE

AC#2 SPACE TEMP

AC#2 SUPPLY TEMP

AC#3 SPACE TEMP

AC#3 SUPPLY TEMP

MOTION SENSOR

120vAC

10VA

50VA

Outside Perimeter

Outside Perimeter

**TESTING NOTES** 

TESTING OF HVAC UNITS THRU EMS PANEL IS

COOLING DOWN A SPACE TEMPERATURE SENSOR

(USING A BLOW DRYER OR ELECTRONIC EQUIPMENT

DUSTER AEROSOL) AND WATCH THE FAN, HEAT AND

COOL STAGES CYCLE ON AND OFF. THIS REQUIRES

SCREEN AND THE OTHER TO WATCH OPERATION OF

TWO PEOPLE AT ALL TIMES....ONE TO WATCH THE

THE AHU. WHEN COMPLETE, PRESS THE HOME

BUTTON TO RETURN TO THE MAIN SCREEN.

ACCOMPLISHED BY SIMPLY WARMING UP OR

Lights

HVAC1 24Vac

HVAC1 Heat1

HVAC1 Heat2

HVAC1 Cool1 HVAC1 Cool1
HVAC2 24Vac
HVAC2 Supply Fan

HVAC2 Heat2

M HVAC2 Cool1

HVAC2 Cool2

M HVAC3 24Vac HVAC3 Supply Fan

M HVAC3 Heat1 HVAC3 Heat2

Maria HVAC3 Cool1

HVAC3 Cool2

HVAC4 24Vac

HVAC4 Heat2

MINION HVAC4 Cool1

HVAC4 Cool2

MVAC5 24Vac

M HVAC5 Heat1

MVAC5 Heat2

HVAC5 Cool1

HVAC5 Cool2

MAC6 24Vac HVAC6 Supply Fan MAC6 Heat1 HVAC6 Heat2 MVAC6 Cool1 HVAC6 Cool2

© OGROUND

70% Lights

**EMS GENERAL NOTES** 

EMS SUPPLIER NOTE: CUSTOMIZED DOLLAR GENERAL

& QTY. OF HVAC UNITS OF THE INSTALL SITE WHEN

ALL QUESTIONS PERTAINING TO THE EMS PANEL,

770-425-2724.

CONTROL WIRING DIAGRAM

EMS2 SCALE: NTS

EMS PANEL REQUIRES STORE #, CITY, STATE, ZIP CODE

ORDERING. EMS SYSTEMS INSTALLATION GUIDE WITH

PHOTOS IS AVAILABLE ON NATIONAL ACCOUNT WEBSITE.

SYSTEM INSTALLATION & SETUP SHOULD BE DIRECTED

TO EMERSON'S DOLLAR GENERAL SUPPORT TEAM AT

ALL SIGN & LIGHTING CIRCUITS MUST BE FED THROUGH

THE DESIGNATED CONTACTORS AS NOTED ON THIS

ALL LOW VOLTAGE HVAC & DOOR SENSORS MUST BE

#8641, 2 CONDUCTOR WIRE OR IT'S EQUIVALENT IS

COOLER & FREEZER HOME RUNS WILL BE TERMINATED AT ALL POINTS BY DOLLAR GENERAL REFRIGERATION

SHIELDED (SHIELD MUST BE GROUNDED) CABLE, BELDEN

CONNECTED TO THE PROPER TERMINAL. 24 GA.

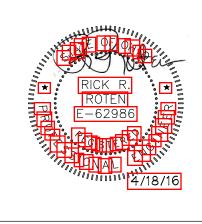
HVAC5 Supply Fan

HVAC4 Supply Fan M HVAC4 Heat1

Maria HVAC1 Supply Fan



3080 SENNA DRIVE Matthews, North Carolina 28105 Phone: 704-841-7288 Fax: 704-849-6997



# DATE REVISION

0

GE

DATE

SPI Client 16137 04-18-16 SHEET NUMBER

Pre-Programmed e2 cx-100 Controller **Escalation Contact List** If you need HVAC Maintenance, call 866-300-0004, option 1. If you have Temperature Set Point concerns, contact your District Load licenses if applicable If you are having problems with 528-5134 your Lights, call 866-300-0004, 528-5096 Load E2 Setpoints If you are having problems with file Load IP address your Coolers, call 866-300-0004, information If you are having problems with your Sign, call 866-300-0004, If your store hours change, call F1 F2 F3 F4 F5 866-300-0004, option 6. ↑ CAUTION! ↑ All power must be shut off prior to wiring, installation, or service. More than one disconnect may be required to de-energize this panel. Inside lights override Outside light override Sign light override **Verifying the Time and Date** From the Home screen. The Date is in the upper left corner of the Home screen. 2. The Time is in the upper right corner of the Home screen. **HVAC Control Status** \* Press the 🖆 Home screen button. \* Select F1 AHU. \* Using the arrow keys, highlight the appropriated HVAC Unit, select enter. \* From the screen you can view: i. Ctzl Temp (Control Temp - The sales floor temp). ii. Values in [] represent the set point we are trying to maintain iii. Space Temp (Temperature at problem on Sales Floor). iv. Supply Temp (Air Temp leaving AHU). v. Status of Fan/Heat/Cools When complete, select the 🖆 Home button. Lighting Status The status of Store Lights can be viewed in the bottom left corner of the 🖆 Home page, or by the following: \* Press the 🗊 Home screen button. \* Select F2 Lighting. \* Highlight the appropriate Lighting Control, then select enter. \* When complete, select the fill Home button. **Refrigerated Case Status** Case Temperature can be viewed from the Home screen. To view a graph of the case temperature: i. Highlight the Temp value and select enter. ii. Select 1 for graph. To zoom select F5 Zoom-In. (Press F5 Zoom-In as many times as necessary, get to the desired scale/range). (Use the left and right arrow keys to move to the time/date range desired). When complete, select the fill Home button. Alarm Status From the Home screen, select Alarm button. 1. Date: The date the alarm occured. 2. Time: The time the alarm occured. 3. State: Notice, Alarm or Fail. \* Notices are general warnings that notify a user of minor errors. \* Alarms are warnings about important system conditions that need immediate attention. \* Fails are high priority conditions, warning the user of a controller or device failure. 4. Property on Board and Point: The item that has generated the alarm. 5. Message: The description of the notice, alarm or fail. Using the up or down arrow keys, highlight the appropriate alarm and select F4 Expd. Info. i. Expd. Info: Expanded Information will give the unit & detailed status on the alarm. ii. When finished viewing detailed status, select enter. EMS SYSTEM SHOULD BE TESTED FOR HVAC OPERATION, INTERIOR LIGHTING, EXTERIOR LIGHTING AND SIGN LIGHTING PRIOR TO CONTRACTOR'S ELECTRICAL POSSESSION DATE. USE OUTSIDE LIGHT AND SIGN LIGHT OVERRIDE FOR EXTERIOR TESTING.

| HIPITIS | INDITES | INDITES | INDITES |

2 PROGRAMMER CONTROLLER EMS2 SCALE: NTS

UOOOOOOOOOOO

all 770-425-272

GENERAL CONTRACTOR TO ENSURE THAT THE BATTERY ENABLE IS SWITCHED TO

"ON" POSITION

1 \ CPU TERMINAL DIAGRAM